

FY2006

DUGWAY PROVING GROUND
UTAH
INSTALLATION ACTION PLAN

Final October 23, 2005

Statement of Purpose

The purpose of the Installation Action Plan (IAP) is to outline the total multi-year Installation Restoration Program for an installation. The plan will identify environmental cleanup requirements at each site or area of concern, and propose a comprehensive approach, with associated costs and schedules, to conduct investigations and necessary remedial actions.

In an effort to coordinate planning information between the restoration manager, U.S. Army Environmental Center (USAEC), Dugway Proving Ground, executing agencies, regulatory agencies, and the public, an IAP was completed. The IAP is used to track requirements, schedules, and tentative budgets for all major Army installation cleanup programs.

All site-specific funding and schedule information has been prepared according to projected overall Army funding levels and is, therefore, subject to change.

The following agencies contributed to the formulation and completion of this Installation Action Plan at the IAP Workshop held March 21-22, 2005:

Dugway Proving Ground
EEI for USAEC
Parsons, Inc.
Shaw
TechLaw
TTEMI
UDEQ - DSHW
US Army Corps of Engineers
US Army Environmental Center
US Environmental Center – PBC

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Acronyms & Abbreviations

~	approximate
AAF	Army Air Field
ABP	Agent Breakdown Product
AC	type of chemical agent munition
(US)AEC	(United States) Army Environmental Center (formerly called USATHMA)
AEDB-R	Army Environmental Database - Restoration
AFB	Air Force Base
AST	Aboveground Storage Tank
ATC	Avery Technical Center
ATEC	(United States) Army Test and Evaluation Command
ATSDR	Agency for Toxic Substances and Disease Registry
BNA	Base Neutral Acid Extratable
BG	biological warfare simulant
Bldg	Building
BTEX	Benzene, Toluene, Ethylbenzene, and Xylene
BZ	type of chemical agent munition
CAP	Corrective Action Plan
CERCLA	Comprehensive Environmental Response Compensation and Liability Act (1980)
CG	type of chemical agent munition
CHPPM	(United States) Center for Health Promotion and Preventive Medicine (formally called USAEHA)
CK	type of chemical agent munition
CMS	Corrective Measure Study
COC	Contaminants of Concern
CONEX	brand name of shipping container
CRP	Community Relations Plan
CS	type of chemical agent munition
CTC	Cost-to-Complete
CWA	Chemical Warfare Agent
cy	cubic yards
DA	Department of Army
DD	Decision Document
DECON	Decontamination
DERP	Defense Environmental Restoration Program (now called ER,A)
DIMP	Diisopropylmethylphosphonate
DNAPL	Dense Non-Aqueous Phase Liquid
DPG	Dugway Proving Grounds
DQO	Data Quality Objective
DRMO	Defense Reutilization Management Office
DSERTS	Defense Site Environmental Restoration Tracking System (now AEDB-R)
DSHW	(UDEQ) Division of Solid and Hazardous Waste
DTC	Development or Ditto Test Command or Defense Test Chamber
EI	Environmental Indicator
EOD	Explosive Ordnance Division
EPA	(United States) Environmental Protection Agency
ER,A	Environmental Restoration, Army (formerly called DERP)

Acronyms & Abbreviations

FFA	Federal Facility Agreement
FFSRA	Federal Facility Site Remediation Agreement
FP	fluorescent particle
FS	Feasibility Study
ft	foot or feet
ft²	square feet
FUDS	Formerly Used Defense Sites
FY	Fiscal Year
gal	gallon
gpd	gallons per day
GA	type of chemical agent munition
GB	Sarin - type of chemical agent munition
GD	type of chemical agent munition
GMA	Groundwater Management Area
GPS	Global Positioning System
Grassy Mountain Facility-	Local TSDF for majority of hazardous waste disposal operations
GW	Groundwater
H	munition with mustard (chemical agent)
HC	type of smoke round
HD	mustard - type of chemical agent munition
HE	type of chemical agent munition
HDPE	High Density Polyethylene
HL	type of chemical agent munition
HR	munition with mustard (chemical agent)
HRS	Hazard Ranking System
HT	munition with mustard (chemical agent)
HTH	High Test Hypochlorite (decontamination solution for CWA)
HWMU	Hazardous Waste Management Unit
IA	Installation Assessment
IAP	Installation Action Plan
IRA	Interim Remedial Action
IROD	Interim Record of Decision
IRP	Installation Restoration Program
ITR	Independent Technical Review
IWTP	Industrial Wastewater Treatment Plant
K	\$1,000
kg	kilograms
L	Lewisite
LTM	Long-Term Monitoring
LTO	Long-Term Operation
MCL	Maximum Contaminant Level
MEC	Munition and Explosive Constituents
mg	milligrams
MMRP	Military Munition Response Program
MNA	Monitored Natural Attenuation
MW	Monitoring Well

Acronyms & Abbreviations

NE	Not Evaluated
NEI	Nature and Extent Investigation
NFA	No Further Action
NPDES	National Pollutant Discharge Elimination System
NOV	Notice of Violation
NPL	National Priorities List
OB/OD	Open Burning/Open Detonation
OU	Operable Unit
O&M	Operation & Maintenance
PAH	Poly Aromatic Hydrocarbons
PA	Preliminary Assessment
PCE	Perchloroethylene
PCB	Polychlorinated Biphenyl
PINS	Portable Isotopic Neutron-Spectroscopy
POL	Petroleum, Oil & Lubricants
POM	Program Objective Memorandum (budget)
PP	Proposed Plan
ppb	parts per billion
ppm	parts per million
PR	Preliminary Review
PY	prior year
RA	Remedial Action
RA(O)	Remedial Action - Operation
RAB	Restoration Advisory Board
RAD	Radiological
RAP	Remedial Action Plan
RC	Response Complete
RCRA	Resource Conservation and Recovery Act
RD	Remedial Design
REM	Removal
RFA	RCRA Facility Assessment
RFI	RCRA Facility Investigation
RI	Remedial Investigation
RIP	Remedy in Place
ROD	Record of Decision
RRSE	Relative Risk Site Evaluation
SARA	Superfund Amendments and Reauthorization Act
SI	Site Inspection
SVE	Soil Vapor Extraction
SVOC	Semi-Volatile Organic Compounds
SWMU	Solid Waste Management Unit
TACOM	(US Army) Test and Evaluation Command
TAPP	Technical Assistance for Public Participation
TCE	Trichloroethylene
TDS	Total Dissolved Solids
TEU	U.S. Army Technical Escort Unit

Acronyms & Abbreviations

TNT	type of explosive
TPH	Total Petroleum Hydrocarbon
UDEQ	Utah Department of Environmental Quality
ug/l	microgram per liter
USACE	United States Army Corps of Engineers
USAEC	United States Army Environmental Center (formerly called USATHMA)
USAEHA	United States Army Environmental Hygiene Agency (now called CHPPM)
USATHMA	United States Army Toxic and Hazardous Material Agency (now called AEC)
USPCI	United States Pollution Control Incorporated
UST	Underground Storage Tank
UXO	Unexploded Ordnance
VOC	Volatile Organic Compounds
VSI	Visual Screening Inspection
VX	nerve agent - type of chemical agent munition
WW	World War
yr	year

INSTALLATION LOCALE: Dugway Proving Ground (DPG) is an approximately 798,000 acre Government-owned and operated chemical, conventional and biological weapons defense test facility. DPG is located in Tooele County, approximately 39 miles southwest of the town of Tooele, Utah.

INSTALLATION MISSION: DPG's mission includes the following elements:

- To serve America's soldiers, citizens, and allies by operating our nation's premier defense proving ground to provide quality testing, data, and information.
- To recognize, trust, empower, and develop a work force team dedicated to mission accomplishment.
- To anticipate and exceed customer expectations using recognized quality standards and processes to advance technology and support all aspects of chemical and biological defense, meteorology, smoke, obscurants, illumination, and munitions testing.
- To conduct all operations consistent with the highest standards of Army Values and environmental stewardship.

COMMAND ORGANIZATION:

MAJOR COMMAND: U.S. Army Test and Evaluation Command (ATEC)

MAJOR SUBORDINATE COMMAND: Developmental Test Command

INSTALLATION: Dugway Proving Ground

LEAD EXECUTOR: U.S. Army Corps of Engineers – Sacramento District

REGULATOR PARTICIPATION:

Federal: U.S. Environmental Protection Agency, Region VIII, Federal Facilities Section

State: Utah Department of Environmental Quality (UDEQ), Division of Solid and Hazardous Waste (DSHW); RCRA authority

NPL & REGULATORY STATUS:

- Non-NPL, Confirmed off-post contamination limited to FUDS
- Consent Order, Sep 90; Amended Dec 93
- Final RCRA Part B Permit with Corrective Action Module, March 94
- Consent Order, Sep 94
- Notice of Violation, Mar 98

PROJECTED DATES FOR CONSTRUCTION COMPLETION AND REMOVAL FROM NPL:

N/A

RAB/TRC/TAPP STATUS: The RAB was formally established in FY 2000. Representatives from the general public, local government, U.S. Environmental Protection Agency, DSHW, and Dugway sit on the RAB. RAB meetings are being held semiannually. Dugway does not anticipate requesting TAPP funds during FY2006.

PROGRAM SUMMARIES:

IRP

Contaminants of Concern: Chemical Agent Breakdown Products, Explosives, Heavy Metals, Petroleum/Oil/Lubricants, Volatiles

Media of Concern: Soil, Groundwater

Estimated date for RIP/RC: 2012/2035+

Funding to Date: (up to FY04): \$123,986,900

Current year funding (FY05): \$8,000,000

CTC: \$94,116,000

CC

There is 1 CC site at Dugway Proving Ground; see the CC IAP for info.

MMRP

There are no MMRP sites at Dugway Proving Ground.

BRAC

There are no BRAC sites at Dugway Proving Ground.

Cleanup Program Summary

HISTORIC ACTIVITY:

DPG was activated on March 1, 1942. Shortly thereafter, military weapons testing commenced under the Technical Division of the U.S. Chemical Corps. From 1942 through 1947, chemical warfare facilities were established and special buildings (typical of enemy construction), caves, and fortification complexes were subjected to bombardment with incendiary and chemical munitions. Chemical munitions tested include phosgene mixtures, mustard mixtures, blood agents, nerve agents, incapacitating agents, and smokes. In October 1943, biological warfare facilities were established at DPG. Numerous microorganisms were tested, including anthrax, plague, tularemia, human dysentery, tuberculosis, and a host of others.

DPG became inactive in January 1947, and was considered a post satellite of the Deseret Chemical Depot (formally the Tooele Army Depot, South Area). The Chemical and the Biological Warfare Divisions were activated at Ditto Technical Center (DTC) in January, 1951. DPG was combined with the Deseret Test Center on July 1, 1968. On October 11, 1973, DPG was assigned to the Commanding General, U.S. Army Test and Evaluation Command (TECOM). In October, 1999, Dugway was assigned to the newly established Developmental Test Command (DTC) under the U.S. Army Test and Evaluation Command (ATEC).

Thousands of munitions containing mustard (H, HD, HT) were tested at DPG during the periods from 1942 to 1945 and 1952 to 1956. A minimum of 1,200 field trials employing 47,900 munitions or dissemination devices were conducted from 1945 to 1968 with agents GB, GA, and VX (USATHAMA, 1979). Large scale conventional munitions testing was conducted at the ranges until the late 1970s.

CURRENT ACTIVITY:

Under the command of the U.S. Army Developmental Test Command (DTC), DPG has the assigned mission of planning, conducting tests, and evaluating chemical warfare systems, flame and incendiary systems, biological warfare vulnerability, and biological defense systems. The majority of testing, excluding range activities, occurs at or in the vicinity of the Avery Technical Center (ATC), the Baker Laboratory Complex, the Carr Laboratory Complex, or the Ditto Technical Center. Hazardous materials associated with these activities are handled and tested at chemical and biological test areas, and artillery, rocket, and explosives test ranges.

PROGRAM PROGRESS:

IRP: Of 205 initially identified SWMU sites, DPG has attained RC on 125 sites. Closures have involved both No Further Action (residential) and industrial risk-based closures as well as removals and cover system installations.

CC: There is 1 CC site at Dugway Proving Ground. Progress to date & future plan of action

MMRP: There are no MMRP sites at Dugway Proving Ground.

BRAC: There are no BRAC sites at Dugway Proving Ground.

DUDWAY PROVING GROUND

INSTALLATION RESTORATION PROGRAM

REGULATORY STATUS: Non-NPL Installation, RCRA Part B Permit, Confirmed off-post contamination associated with Formerly Used Defense Sites (FUDS)

AEDB-R SITES: 205

RC SITES: 140

AEDB-R SITE TYPES:

6 Burn Areas	2 Fire/Crash Training Areas	9 Contaminated Buildings
2 Contaminated Soil Piles	2 Contaminated Fill	1 Drainage Ditch
1 Chemical Disposal	1 Contaminated Groundwater	51 Landfills
17 Surface Disposal Areas	1 Bldg Demo/Debris Removal	14 Disposal Pit/Dry Wells
3 Leach Fields	9 Washracks	4 Incinerators 1 Pesticide Shop
3 Spill Site Areas	1 Sewage Treatment Plant	4 Waste Lines
7 Radioactive Waste Areas	1 Waste Treatment Plant	10 Other
5 Surface Runoff	25 Storage Areas	9 Surface Impoundments/Lagoons
9 Above-Ground Storage Tanks		2 Underground Storage Tanks
2 Unexploded Munitions/Ordnance		3 Explosive Ordnance Disposal Areas

CONTAMINANTS OF CONCERN: Chemical Agent Breakdown Products, Explosives, Heavy Metals, Petroleum/Oil/Lubricants, Volatiles

MEDIA OF CONCERN: Soil, Groundwater

COMPLETED REM/IRA/RA:

Site Access Control Measures at DPG-002, 007, 009, 014, 033, 036, 038, 040, 051, 058, 063 (FY88), DPG-158 (FY90), DPG-017 (FY91), DPG-034, 042, 043, 055, 090, 099, 160, 161, 162, 163, 164, 165, 166, 167, 168, 169, 170 (FY92), DPG-046 (FY93), DPG-010, 011, 012, 015, 021, 022, 023, 025, 031, 032, 035, 059, 124, 128 (FY94), DPG-037, 048, 204 (FY96), DPG-199 (FY97), DPG-212 (FY98)

Waste Removal at DPG-039, 099, 174 (FY92), DPG-001, 013, 016, 017, 018, 019, 028, 040, 052, 056, 065, 101, 103, 104, 107, 113, 115, 117, 188, 190 (FY93), DPG-003, 004, 005, 006, 008, 029 (FY94), DPG-014 (FY95), DPG-122, 130 (FY96), DPG-059, 199 (FY98), DPG-034, 099 (FY99), DPG-033, 051, 058, 063, 128 (FY00), DPG-007, 048, 063 (FY01), DPG-003, 017, 047, 180 (FY02)

Pipeline Removal at DPG-048, 130, 162 (FY99)

Waste and Facility Removal at DPG-036 (FY00)

Installation of Evapo-transpiration cap at DPG-002 (FY02)

Redmedial activities completed at DPG-042, 046, 047 (FY03-04)

IRAs completed at 003, 044, 116, 185, 193, 197, 205, 206, 211, 214, 216 (FY03-04)

TOTAL ERA FUNDING:	PRIOR YEAR (FY79-FY04):	\$123,986,900
	CURRENT (FY05 expected):	\$8,000,000
	FUTURE (FY06+):	\$94,116,000

DURATION OF IRP:	Year of IRP Inception:	1978
	Year of RA Completion:	2012
	Year of IRP Completion:	2035+

Historical waste disposal practices have generated possible contamination at 205 Solid Waste Management Units (SWMUs). Many of these SWMUs are affiliated with DPG's mission to test chemical, biological, and conventional weapons, but some SWMUs are characterized by more generic practices such as sanitary waste disposal, photo developing, transformer disposal, and sanitary landfills.

In 1977, English Village water supply wells 18 and 19 were taken out of potable service due to increasing levels of nitrate in 1972 and 1967, respectively. No definable source was ever found for this increase.

An initial installation assessment completed in April 1979 concluded that there was no potential for off-post migration of hazardous wastes at DPG. The assessment also concluded that because of the probability that unexploded ordnance, including chemical agent rounds, may be located in many areas of DPG, the installation range areas should be considered hazardous to personnel.

Hazardous Waste Management Units (HWMUs):

The Consent Order negotiated between the State of Utah and DPG on 13 September 1990 required the investigation and development of closure plans for 41 sites that ceased hazardous waste operations after 1980. Since the signing date, four HWMUs have been dropped and one has been added. The contaminants of concern for the Consent Order HWMUs are: VOCs, BNAs, agent, agent breakdown products, pesticides, PCBs, explosives, and metals. The objective of the consent order site investigation was to develop closure plans for the 34 consent order HWMUs. The investigation was divided into three mobilizations or field phases, during which all of the HWMUs were investigated. Mobilization I began on 27 July 1992 and ended 6 November 1992; 30 HWMUs were investigated during this time. Mobilization II started on 10 May 1993 and ended 7 October 1993; 35 HWMUs were investigated during this time. Nature and Extent plans for 41 HWMUs were submitted to the installation and regulators in March - August 1993. Mobilization III began in January 1995 and ended in May 1995. Closure plan development began in December 1993. Three HWMUs have been approved for Administrative Closures. HWMUs 33 and 36 were remediated in 2000. HWMU 48 was remediated in 2001. Final removals were completed for DRP-042, 046 and 047. Administrative closures were completed for DPG-099 and 190.

Solid Waste Management Units (SWMUs):

On March 20, 1992, the Executive Secretary for the Utah Division of Solid and Hazardous Waste finalized the RCRA Facility Assessment (RFA) for SWMUs located on DPG. The purpose of the RFA was to identify and describe SWMUs and determine the existence of the likelihood of a release. A Preliminary Review (PR) was completed first in order to review pertinent documentation such as inspection reports, permit applications, aerial photos, and disposal records. Over 169 SWMUs were identified based on the PR. A Visual Screening Inspection (VSI) was then conducted in the summer of 1991, which deleted 11 SWMUs from the list. The final RFA lists 121 SWMUs, which need to be investigated in the RCRA Facility Investigation (RFI). During the RFI investigation, SWMUs are being added, deleted, and consolidated as more information is obtained. DPG currently is investigating 111 SWMUs under the RCRA Corrective Action module of the RCRA hazardous waste storage permit issued 15 March 1994 by the State of Utah Department of Environmental Quality. A Phase I RCRA Facility Investigation (RFI) was performed from August 1993 to June 1994. The purpose of the RFI was to confirm or deny the presence of hazardous waste

at the 111 SWMUs. 68 sites continue to be investigated under the Phase II RFI, several of which contain other SWMUs that have been combined into the 68 due to proximity or waste process. SMWUs sites with biological warfare agents as contaminants of potential concern are being deferred until characterization protocols are finalized.

No off-post contamination has been confirmed with the exception of SWMUs 67, 126, and 127, which are FUDS under the USACE.

Cleanup Exit Strategy: Please see the individual site pages for a exit strategy for each site.

Previous Studies

1975

- Army Material Command Test and Evaluation Command: Environmental Impact Assessment: Proposed Hercules, Incorporated Rocket Motor Test Site
- Program Manager for Chemical Demilitarization and Installation Restoration: Basic Plan for the Assessment of DPG Phase V Toxic Residue Stored at Tower Grid and West Granite Holding Areas

1976

- Installation Environmental Impact Assessment for United States Dugway Environmental and Life Sciences Division, Material Test Directorate

1977

- Soil Samples West Granite Disposal Area, Project Manager for Chemical Demilitarization and Installation Restoration

1979

- U.S. Army Toxic and Hazardous Materials Agency: Initial Installation Assessment of DPG

1983

- U.S. Army Environmental Hygiene Agency: Phase 2 Hazardous Waste Management Study No. 37-26-0147-84, DARCOM Open Burning/Open Detonation Grounds Evaluation

1984

- USACE: Analysis of Existing Facilities Environmental Assessment Report: Planning Corp.

1986

- El Dorado Engineering, Inc.: Hazardous Waste Study for DPG, Volume 1, prepared for the U.S. Army Toxic and Hazardous Materials Agency

IRP Contamination Assessment

1987

- U.S. Army Environmental Hygiene Agency: Interim Final Report Ground-Water Contamination Survey No 38-26-0847-88 Evaluation of SWMUs, DPG, 6-10 Apr 87, prepared for the U.S. AMC

1988

- Environmental Science and Engineering, Inc.: Update of the Initial Installation Assessment of DPG
- R&M Consultants (ESE): Report of Findings, Geohydrologic Study: Phase 1 DTC and 3008 Evaporation Ponds, English Village and Fries Park Landfills
- Installation Restoration Program Plan for Dugway Proving Ground

1992

- Executive Secretary of the Utah Solid and Hazardous Waste Control Board: RCRA Facility Assessment of Solid Waste Management Units at U.S. Army DPG
- EBASCO: Geophysical Investigation of Solid Waste Management Unit 20, Camels Back Ridge
- EBASCO: Geophysical Investigation of Solid Waste Management Unit 160, Air Force Pad No. 777, Landfill No. 1

1994

- Engineering Technologies Associates: Preliminary Assessment Dugway Proving Ground

1995

- Ebasco Services Inc.: SWMU Closures at Dugway Proving Ground, Interim Report. Final Phase 1
- Ageiss Environmental and The IT Group: Annual Groundwater Monitoring Reports

1996

- Ebasco Services, Inc.: Module 3 Closure Plan: September
- Ageiss Environmental and The IT Group: Annual Groundwater Monitoring Reports

1997

- Ageiss Environmental and The IT Group: Annual Groundwater Monitoring Reports

1998

- Ageiss Environmental and The IT Group: Annual Groundwater Monitoring Reports

1999

- Parsons Engineering Science Inc.: RCRA Facility Investigation, Investigation Report, Final Phase 1
- Ageiss Environmental and The IT Group: Annual Groundwater Monitoring Reports

IRP Contamination Assessment

2000

- Parsons Engineering Science Inc.: Draft Characterization and Recommended Use of Facility-Wide Background Soil Metals Data
- Ageiss Environmental and The IT Group: Annual Groundwater Monitoring Reports

2001

- Ageiss Environmental and The IT Group: Annual Groundwater Monitoring Reports

2002

- Ageiss Environmental and The IT Group: Annual Groundwater Monitoring Reports
- IT Corp: Final Closure Report for HWMU 34 - Baker Boiler House Sump
- IT Corp: Final Supplemental Investigation Report for HWMU 47 - Former English Village Sewage Lagoons
- Parsons Engineering Science Inc.: Final (Rev 2), Risk Assumptions Document for Phase II RFI
- Montgomery Watson Harza: Draft Final Closure Certification for HWMU 7

2003

- Montgomery Watson Harza: Final Closure Certification for HWMU 59 - Pad 7 3X Storage Area in Carr
- Parsons Engineering Science Inc.: Draft Final Hydrogeological Assessment and Regional Groundwater Management Plan, Volume 1, Ditto Groundwater Management Area
- Shaw: Final Closure Report for HWMU 2 - Waste Pile at North end of Granite Peak
- Shaw: Revised Final Remedial Action Closure Report for HWMU 33 - Baker Area Sewage Lagoon
- Shaw: Final Closure Report for HWMU 99 - Camels Back Ridge Former 3X Storage Site

DUGWAY PROVING
GROUND
INSTALLATION RESTORATION
PROGRAM
SITE DESCRIPTIONS

SCRAP CONSTRUCTION FILL, N GRANITE PEAK

SITE DESCRIPTION

DPG-002, known as the Waste Pile at the North End of Granite Peak, is a burial pit located north of Granite Peak, approximately 1,000 ft north of Stark Road. It was used in the 1940s to 1990, and is ~300 x 400 ft. This central portion of DPG is now primarily used for test ranges. In the past, munitions disposal, decontamination, and other demilitarization activities were also conducted in this portion of DPG. DPG-002 was used to dispose of a variety of solid wastes generated during range cleanup and the demilitarization activities. The unit consists of two trenches that are positioned end to end and are approximately 50 ft apart.

Approximately 4.9 tons of scrap material was removed under a base contract and transported to the Defense Reutilization Management Office (DRMO) at Tooele Army Depot. 31 tons of surface waste was disposed of at the DPG landfill. In 1988, warning signs were placed at DPG-002 for site control purposes. Groundwater monitoring began at DPG-002 in 2000. Shallow groundwater at this site is considered Class 4 (high TDS). A soil cover cap design was approved and constructed in FY02.

CLEANUP STRATEGY

The post closure permit is pending and is expected by Sept 2005.

Groundwater monitoring and cap maintenance will continue as needed (assumes until 2036).

STATUS

RRSE RATING: High

LEGAL DRIVERS: Consent Order

CONTAMINANTS: VOCs, BNAs, ABPs, Explosives, Metals

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	199111	199609
RFI/CMS.....	199606	199906
IRA.....	198804	198808
DES.....	199910	200112
CMI.....	200012	200307
LTM.....	200307	203307

RC: 200307

VEHICLE DECOM PAD AND BLDG T-9410

SITE DESCRIPTION

This is a 7-acre site in the All Purpose Grid area with a 450 ft² concrete pad, was active 1960s and reportedly was used for decontamination of VX contaminated vehicles. Also located at the site are a building, bermed surface depression, stained soil, three mounded areas, a trench, two drainfields, two sewer lines, a septic tank, and a transformer. The sewer lines reportedly handled fluids utilized for decontamination purposes. Marston matting is present on the ground surface in the western portion of the site; discarded batteries and glassware are visible in several areas.

The area investigated as the decontamination pad area was actually determined to be the site of a former maintenance shop. The actual decontamination pad area was located, along with a burial site, following the Phase I investigation. A Phase II RFI is underway. Due to the proximity and similarity of DPG-001 and DPG-005, these sites have been combined with DPG-003 for the Phase II RFI. ABPs were detected in the sewer lines and drainfields. An IRA was performed in 1993 to remove marston matting debris. A Source Removal Investigation has been completed to remove a fuel UST and contaminated soil and to complete the site characterization.

There is potential for VX residue to be present beneath the existing Decon Bldg and the adjacent drainfield.

A benzene plume has been detected around the former UST.

CLEANUP STRATEGY

The Phase II RFI is expected to be approved in June 2005 and the permit modified in Sept 2005.

This site is expected to be included in the FY05 PBC award.

Complete a CMS Report. Soil cover over a number of areas (8 areas) is expected to be the preferred remedy, along with building and debris removal, decontamination (3X) and disposal in an approved landfill. 30 years of LTM is expected to follow.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Arsenic, ABPs, Benzene

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	200305	200601
IRA.....	199310	199412
DES.....	200601	200610
CMI.....	200510	200707
LTM.....	200710	203707
RC expected: 200707		

OLD BAKER LAB @ NORTH GRANITE PEAK

SITE DESCRIPTION

This is a 220-acre site of former biological laboratory and self-supporting facility located at the north end of Granite Peak, active during the 1940s to 1953. The site consists of numerous trenches and disposal areas, building foundations, and concrete rubble and debris from the demolished buildings.

Approximately 20,000cy of miscellaneous rubbish was removed in 1994 under a base contract. The presence of large amounts of rebar interfered with geophysical surveys performed near the demolished buildings.

Phase I RFI activities included relatively limited soil sampling due to the lack of information regarding locations and past uses of the site. The groundwater has not been sampled.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Metals (Lead), PAHs, Pesticides

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200709
IRA.....	199310	199412
DES	200710	200809
CMI.....	200810	200909
RC expected: 200909		

CLEANUP STRATEGY

Complete a Phase II RFI report (final Dec 2006).

This site is expected to be in the FY07 PBC award. The removal of 2 waste piles and debris may be needed. Maintain institutional controls.

SURFACE STORAGE AREA VIC 10 MILE TOWER

SITE DESCRIPTION

This is a 13-acre site of three bermed areas (each 11,000 ft²), a 55-gallon drum staging area, and an apparent burn area located in the All Purpose Grid area and active during the 1970s.

Approximately 6 tons of debris was removed under a base contract in 1993. Debris consisted of an empty decomposed fuel bladder, a lead acid battery, several hundred feet of electrical cable, empty 55-gallon drums. Debris was transported to DPG landfill for disposal.

Hydropunch sampling has detected a benzene plume (700 x 600 ft) in shallow groundwater. PAHs have been detected in the soil.

The RFI report was approved in Sept 2004.

CLEANUP STRATEGY

This site is expected to be included in the FY06 PBC. LTM is expected for the groundwater (assumes for 30yrs).

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

TPH, VOCs (Benzene), PAHs

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200406
IRA.....	199305	199412
DES.....	200407	200508
CMI.....	200509	201009
LTM.....	201009	204711
RC expected: 201009		

DPG-008

BURIAL SITE WEST GRANITE PEAK

SITE DESCRIPTION

This is a 50 ft diameter waste pile in a 4 ft deep pit located west of Granite Peak, reportedly the site of a former building, active during the 1970s.

Approximately 32 tons of debris was removed in 1993 and transported to DPG landfill. This debris included remnants of an old building, scrap wood, wire, wooden spools, cardboard rolls, plastic bottles, and unknown ordnance. One load of recyclable iron was transported to DPG-007 for consolidation. Additionally, DPG Technical Escort and Disposal Detachment removed four unexpended HC smoke rounds for disposal.

CLEANUP STRATEGY

A soil and debris removal is planned for summer 2005.

Complete the Phase II RFI sampling (for dioxins) and report (final expected in Sept 2006).

STATUS

RRSE RATING: High

LEGAL DRIVER: Corrective Action

CONTAMINANTS:
PAHs, SVOCs, Dioxins

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	200308	200609
IRA.....	199310	199412
RC expected: 200609		

DPG-009

STORAGE SITE 3X SCRAP MATERIAL

SITE DESCRIPTION

This is a 2.5-acre area, located in the central portion of DPG at the western flank of Granite Peak. The site includes an open storage area and staging area where waste was added from 1975 to 1976. This site was primarily used for the aboveground storage of range debris from range clearance activities, 3X-decontaminated material from the West Granite Holding Area (DPG-192), and for limited burial operations.

In 1988, warning signs were placed at DPG-009 for site control. In 1990, M55 rocket motors and fiberglass shipping containers, classified as F999 waste, were removed from the site and transported to Grassy Mountain facility for disposal. The 3X-decontaminated material accumulations were removed from the site by 1993. Scrap metal was taken to the DRMO at Tooele Army Depot, rocket residue was sent to Grassy Mountain, and miscellaneous rubbish was disposed in the DPG landfill. After the debris piles and debris in the trench were removed, the fenced area was disked and graded to uncover additional near-surface metal debris. Some debris, including M55 warheads, CS submunitions, and 8-inch artillery rounds, are still present on the site. A pile of 376 M55 rockets is present at the site.

Additional investigation is needed to identify the location of suspected burial trenches.

Testing results indicate that any PCB-related concerns with an open detonation operation are unfounded.

CLEANUP STRATEGY

This site is expected to be included in the FY05 PBC award.

Additional investigation is planned. Debris removal and a HDPE cap (over trenches) are expected.

Future remediation response options for the rockets are being considered. The cost for shredding the rockets has been included; however, this option may change.

Pursue open detonation option.

STATUS

RRSE RATING: High

LEGAL DRIVERS: Consent Order

CONTAMINANTS: VOCs, BNAs, ABPs, Explosives, Metals

MEDIA OF CONCERN:

Soil, Possibly Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	199111	199609
RI/FS.....	199609	200709
IRA.....	198802	200710
DES.....	199901	200710
CMI.....	200802	200909
LTM.....	200909	203909

RC expected: 200909

LOW LEVEL RAD BURIAL PITS, E GRANITE PEAK

SITE DESCRIPTION

This is a 16-acre site, corresponding to the location of the former East Granite Holding Area (active 1950 to 1977), consisting of three open trenches and two backfilled trenches. The backfilled trench was used for the disposal by burning of beryllium-containing missile propellant waste accepted by the Army from the Air Force in 1965. Types of materials that have been stored at the holding area included tritium and carbon-14, which were placed there between 1958 and 1977.

Removal of debris first occurred in March 1980 when DPG Radiation Protection Office collected glassware contaminated with carbon-14 and delivered it to the chemical laboratory in the Ditto area for disposal. Removal of debris continued through 1985 where materials were transported to a munitions igloo located in the Baker Area (DPG-174). Stained soil observed in excavation pits during Phase I activities were believed to indicate contamination from burning activities. In 1993, warning signs were placed at DPG-011 for site control.

A Phase II RFI Work Plan has been completed and the field work is scheduled for summer 2005.

CLEANUP STRATEGY

Complete Phase II RFI (expected final in Sept 2006) and CMS reports.

This site is expected to be included in the FY07 PBC award.

Soil and debris removal is expected.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Radiation (Alpha), Beryllium

MEDIA OF CONCERN:

Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199604	200703
IRA.....	199310	199412
DES.....	200710	200809
CMI.....	200909	201209
RC expected: 201209		

DPG-014

DISPOSAL SITES, JCT DOWNWIND & JULIET RD

SITE DESCRIPTION

DPG-014 is located at the southern end of the Downwind Grid in the central portion of DPG, southeast of Granite Peak. The site consists of a trench with a vehicle access ramp, a soil pile, and a detonation crater. Waste was added from the 1960s to 1980. When it was originally designated, the unit consisted only of an excavated area and the adjacent soil pile. The excavated area was approximately 95 x 40 ft wide, and 12 to 15 ft deep when active, and the pile of excavated soil was approximately 6 to 8 ft high. This site was used to manage a wide range of solid waste materials, including range-related debris such as tear gas and fog oil canisters, empty decontamination fluid containers, smoke pots, 155-millimeter (mm) ordnance fragments, CS bomblets, several types of munitions including M55 rockets, magnesium-filled incendiary rounds and munitions with unknown contents and wooden ammunition cases.

STATUS

RRSE RATING: High
LEGAL DRIVERS: Consent Order
CONTAMINANTS: VOCs, BNAs, ABPs, Explosives, Metals
MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	198601	198802
CS.....	199111	199609
RFI/CMS.....	199609	200601
IRA.....	198802	199512
DES.....	200601	200603
CMI.....	200610	200704
LTM.....	200804	203804

RC expected: 200704

Site control measures were taken in 1988, with warning signs placed about the area. Removal of some of the debris occurred from 1993-1995. Munitions were stockpiled and destroyed on-site by Army EOD; rubbish was hauled to the DPG landfill; and scrap was transported to the DRMO. Minimal ordnance debris remains on site. Groundwater monitoring has been conducted at DPG-014 since 1996. Additional groundwater assessment activities were conducted in FY01. No significant contamination was found in groundwater.

Groundwater monitoring requirements were reduced in 2003.

CLEANUP STRATEGY

This site is expected to be included in the FY05 PBC award.

Additional investigation is planned. A cap with surface MEC removal is expected. Future requirements will be evaluated during the closure design.

RISING SUN TEST AREA (DISPOSAL SITE)

SITE DESCRIPTION

This is a 1-sq mile site of former underground tunnel fortifications located in the Tower Grid area which was active in the 1940s. The site was reportedly used to test agent munitions (including CG, CK, H, and HD agents) on underground fortifications.

In 1993, warning signs were placed in the area for site control purposes. Construction debris, ordnance fragments and possible chemical-agent related ordnance are scattered across the site, and the explosive risk is considered to be high. Because of this risk, a very limited Phase I investigation was performed, which consisted of a GPS Survey (used for mapping purposes). A Phase II RFI is underway. However, a geophysical survey is required in advance of future test pitting or sampling.

STATUS

RRSE RATING: NE

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Chemical Agents, ABPs, Explosives

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200606
IRA.....	199310	199412
DES.....	200710	200706
CMI.....	200705	200805
RC expected: 200805		

CLEANUP STRATEGY

Complete the Phase II RFI (expected final in July 2006), including geophysical survey (planned for summer 2005).

This site is expected to be included in the FY07 PBC award.

Debris removal is expected.

DECON PAD, JCT EAST DOWNWIND & HWY 102

SITE DESCRIPTION

The 2-acre site is a former area for decontaminating agent-contaminated vehicles located in the Tower Grid area, and was active 1950s to 1960s. A debris pile was located near the pad area and contained practice bombs, rocket motors, vials, and miscellaneous debris. An open trench (140 x 30 ft), two circular mounds, a pump house, an AST, and several drainage ditches were also present.

Approximately 80 tons of debris was removed under a base contract in 1993. The debris removed consisted of metal track rails and the large waste pile containing practice ordnance, rocket piles, glass and other miscellaneous debris; Marsten matting from decon pad; regarded pad platform, soil removed destination not specified as part of interim measures during Phase II RFI. The AST and pump house were not removed. Phase I activities included soil and groundwater sampling and a hydrogeological study. The RFI report was approved in Oct 2003. No further action is needed.

STATUS

RRSE RATING: High

LEGAL DRIVERS:
Corrective Action

CONTAMINANTS:
SVOCs, TPH, Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200509
IRA.....	199305	199310
RC: 200509		

CLEANUP STRATEGY

Abandon 4 wells and the pump house (to be completed in FY05).

AGENT DISPOSAL SITE @ S TOWER GRID**SITE DESCRIPTION**

This is a 178-acre fenced waste burial area located in the Tower Grid area, active from 1950 to 1977. The site was reportedly used during demilitarization of chemical weapons. There are three trenches, six mounds, a drum storage area, and a concrete pad. In 1991, warning signs were placed in the area for site control purposes. Approximately 46.6 tons of debris were removed under a base contract in 1993. The debris removed consisted of demilitarization residues, equipment and non-military related debris. Approximately 15.4 tons of this debris were hauled to the DRMO, while 31.2 tons of agent decontaminated materials were disposed as F999 waste at the Grassy Mountain facility.

The explosive risk associated with this site is considered to be high during Phase I activities, so all soil and groundwater sampling was performed outside of the fenced area. Elevated metal levels in soil and down-gradient groundwater samples were duplicated in the upgradient well, so there is doubt that DPG-017 is the source. During site reconnaissance, new burial pits were discovered in the SW corner of the site. New monitoring wells were installed adjacent to the newly discovered burial pits. Limited debris removal was completed in fall 2002.

The Phase II RFI report is expected to be submitted to the DSHW in Dec 2004. Explosives, metals and ABP were detected in soil.

CLEANUP STRATEGY

The Phase II RFI report is expected final in April 2005 with the permit modified in Sept 2005.

This site is expected to be included in the FY05 PBC award.

Soil and debris removal and capping of 6 areas is expected.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

ABPs, Metals, Explosives

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200601
IRA.....	199107	199310
DES.....	200601	200609
CMI.....	200601	200701
LTM.....	200701	203701

RC expected: 200701

DPG-018

DISPOSAL SITE @ SE TOWER GRID

SITE DESCRIPTION

This is a 0.3-acre site of an unlined trench (60 x 15 ft), two soil mounds, and metal tower sections located in Tower Grid area, active in the 1960s to 1970s. Reportedly, agent-containing wastes were disposed of in the trench. Formerly, the trench contained scrap wood and metal, wire, filters, smoke canisters, munitions fragments, 55-gallon drums, and cable.

In 1993, 28.5 tons of this debris was removed under base contract, including the metal tower sections, and disposed at the DPG landfill. 2.5 tons of suspected agent-decontaminated debris was removed and disposed of at the Grassy Mountain facility. The final Phase II RFI was approved in Oct 2003. The final CMS was approved in Nov 2003.

CLEANUP STRATEGY

This site is expected to be included in the FY05 PBC award.

Remove metals-contaminated soil and debris.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Metals (Lead, Antimony)

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200311
IRA.....	199305	199311
DES	200510	200610
CMI.....	200709	200910

RC expected: 200910

DPG-019

DISPOSAL SITE @ NE TOWER GRID

SITE DESCRIPTION

This is a 0.3-acre site of an unlined trench (60 x 10 ft), a partially back-filled pit, and two soil mounds, located in the Tower Grid area, active in the 1960s to 1970s. Formerly, the trench contained scrap wood and metal.

Approximately nine tons of debris was removed under base contract and disposed at the DPG landfill in 1993. The debris removed consisted of miscellaneous cans/containers, metal scrap, and miscellaneous rubbish. At the eastern end of the trench, there remains a partially buried 1,000-gallon tank. Due to the presence of the tank, a Phase II RFI is being conducted. The tank was removed in Feb 2003. The final RFI was approved in Feb 2005.

CLEANUP STRATEGY

The permit is expected to be modified in Sept 2005.

This site is expected to be included in the FY05 PBC award.

Soil and debris removal and capping is expected. LTM will follow.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Chemical Agent, Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200601
IRA.....	199305	199310
DES.....	200601	200609
CMI.....	200703	200709
LTM.....	200709	203805

RC expected: 200709

DISPOSAL SITE @ N CAMELBACK RIDGE

SITE DESCRIPTION

This is a 3-acre site of a fenced disturbed area located in the Ditto area, active from the 1940s to 1950s. The disturbed area includes a large mound and several cave-in areas. Outside of the disturbed area is a metal debris pile and scattered wood, metal, glass, and plastic scrap material. Reportedly, the site was used for the disposal of target grid samplers. Each sampler consisted of a vacuum pump, solenoid, and radio receiver. Although knowledge of the burial of munitions is not known at the site, numerous rocket motors and ordnance fragments were found at the surface. Lead acid batteries also may have been disposed at the site.

Because the explosive risk at the site is considered to be high, all soil and groundwater sampling was performed outside the fenced area during the Phase I activities. In 1993, warning signs were placed in the area for site control purposes. Wells were installed into the shallow groundwater adjacent to the burial trenches. TCE has been detected in one well.

CLEANUP STRATEGY

The final RFI is expected to be approved in summer 2005 and the permit will be modified in Sept 2005. Complete CMS report.

This site is expected to be included in the FY05 PBC award.

Soil and debris removal and capping is expected. LTM will follow.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Metals, ABPs, TCE

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200601
IRA.....	199310	199412
DES.....	200601	200606
CMI.....	200602	200705
LTM.....	200706	203706

RC expected: 200705

WASTE BURIAL SITE (TOWER GRID)

SITE DESCRIPTION

This is a 0.8-acre abandoned burial site consisting of a L-shaped depression and paved access area located near Tower Grid, and was active during the 1950s. The L-shaped area contains a backfilled trench overlaid by a soil mound, and a smaller mound with some scrap metal. Numerous cave-ins are present in the backfilled trench at the southern end of the depression, and a large unvegetated, disturbed area is located on the northern end of the depressed area. The site was reportedly used for the disposal of classified waste (Trial C-990) residues.

In 1993, warning signs were placed in the area to control the site. The final Phase II RFI report was approved in Sept 2004.

CLEANUP STRATEGY

The permit is expected to be modified in Sept 2005. Finalize the CMS.

This site is expected to be included in the FY05 PBC award.

Capping and LTM may be needed.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200603
IRA.....	199310	199412
DES.....	200604	200611
CMI.....	200702	200709
LTM.....	200709	200803

RC expected: 200709

DISPOSAL AREA JCT LIMA & STARK ROADS

SITE DESCRIPTION

This is a 0.4-acre site of soil mound (50 ft diameter, <1 ft high) located in the Downwind Grid area, active from 1950 to 1955. The site was reportedly used to dispose of red and white phosphorus residues.

In 1993, warning signs were placed in the area to control the site. Following Phase I RFI, a new location for DPG-25 was found. This new location was investigated during Phase II. Acetone and carbon disulfide were detected in groundwater; chloroform, methylene chloride, and trichloroflouromethane were detected in the soil; and PCE was detected in the soil gas. The RFI report was approved in Oct 2004.

CLEANUP STRATEGY

The permit is expected to be modified in Sept 2005. Finalize the CMS.

This site is expected to be included in the FY05 PBC award.

Capping may be expected.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Arsenic, Solvent

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200510
IRA.....	199310	199412
DES.....	200511	200609
CMI.....	200703	200709
LTM.....	200709	203809

RC expected: 200709

WASTE BURIAL SITE (NORTH WIF MOUNTAIN)

SITE DESCRIPTION

This site is a 0.9-acre partially backfilled trench. The site is located in the All Purpose Grid area and was active from the 1950s to 1960s. Although the exact type and amount of waste disposed at this site is unknown, it is reported to contain refuse such as metal and scrap.

In 1993, warning signs were placed in the area to control the site. During Phase I activities, an area of disturbed ground (50 x 150 ft) was noted on the west side of Cherait Road. However, this did not conform to historical descriptions of the site. No sampling of this disturbed ground was performed. The correct location has now been identified.

CLEANUP STRATEGY

Complete a RFI Work Plan, RFI and CMS. The RFI field work is scheduled for the fall 2005.

This site is expected to be included in the FY07 PBC award.

Soil removal may be needed.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Suspected Biological Waste

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200611
IRA.....	199305	199412
DES.....	200701	200704
CMI.....	200705	200709

RC expected: 200709

DUMP SITE SW OF BAKER LABORATORY

SITE DESCRIPTION

This is a 3.6-acre site of six distinguishable unlined trenches, four mounds, four debris piles, a 500 ft² area having little or no vegetation, and a drum storage area located in the Baker area, active from the 1950s to 1960s. The site is reported to contain wastes from Baker activities, including autoclaved lab materials and wastes, animal cages, incinerator ash, melted glass, burnt materials, demilitarization materials, steel piping, and construction materials.

Warning signs were placed at the site in 1993. The Phase II RFI is underway (sampling is scheduled for fall 2005).

CLEANUP STRATEGY

Complete the RFI and CMS.

This site is expected to be included in the FY07 PBC award.

Capping of three areas is expected.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Metals, Biological Agents, PAHs

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200706
IRA.....	199305	199412
DES.....	200707	200803
CMI.....	200805	200809
LTM.....	200809	203909

RC expected: 200809

DRAINFIELD, NORTH OF BAKER LABORATORY

SITE DESCRIPTION

This is a 5-acre site immediately northeast of Baker, active from 1944 to 1975. The site consists of a drainfield (fenced, ~5 acres), piping to the treatment plant, a wet well, and the abandoned treatment plant (including 8 holding tanks) itself. Effluent discharged into the sewer system included sanitary wastes, laboratory chemicals, and other liquid wastes from the Baker area.

Warning signs were placed at the site in 1993. The sewage treatment plant and associated piping were not investigated during the Phase I investigation because the facilities were added to DPG-035 after the Phase I investigation. The Phase II RFI is underway.

CLEANUP STRATEGY

The tanks and piping will be removed and confirmatory samples will be taken (Jan 2006). The final RFI report is expected to be approved in March 2007.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Biological Agents, Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200703
IRA.....	199305	199412
RC expected: 200703		

IMHOFF TK/DRAINFIELD AT DITTO TECH CTR

SITE DESCRIPTION

DPG-036 was the primary wastewater treatment facility for the Avery, Ditto, and Michael Army Airfield area from 1944 until it was replaced by three sewage lagoons in early 1994. Wastewater generated at the facilities in these areas was carried to DPG-036 via a 10 inch-diameter vitrified-clay sanitary sewer to an area west of Ditto and north of Stark Road. Facilities in these areas that discharged to the sanitary sewers include: an aircraft hanger, a power plant, a heavy equipment shop, gas station, a dispensary, a laundry facility, several offices, a cafeteria, and biological, chemical, and photographic laboratories. Prior removal actions consist of sludge (twice per year), and wastewater removal, both from the Imhoff tank. Warning signs were placed at the site in 1988. Since the tank's abandonment in 1994, groundwater has partially infiltrated the tank through a crack in the tank wall. Groundwater monitoring has been conducted at DPG-036 since 1996.

STATUS

RRSE RATING: High
LEGAL DRIVERS: Consent Order
CONTAMINANTS:
 TCE, Chlorobenzene
MEDIA OF CONCERN:
 Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	198905	199609
RFI/CMS.....	199609	199906
IRA.....	198802	198802
DES.....	199806	200107
CMI.....	200108	200309

RC: 200309

A Remedial Design/Remedial Action to decontaminate the associated pumphouse vault and sump; remove the sludge drying bed (47 ft²); and demolish the aboveground portion of the Imhoff tank (48 x 27 x 22 ft deep) was completed in 2000. Cone-penetrometer and hydropunch work was performed in 2001 to better delineate the groundwater contamination plume.

Removal of tank contents was performed in FY94. All remaining waste was removed from the site in FY01.

This site was included in the ITR program. ITR recommendations included closing the Imhoff tank in-place and including agent breakdown products in the groundwater monitoring analytical suite. The closure in-place recommendation was implemented. However, the aboveground portion of the tank was removed to simplify post-closure maintenance requirements. Dugway also performed a 5-year review of the groundwater monitoring program. Due to the lack of ABP detections during Mobilizations 1, 2, and 3; in a concrete core sample collected from the tank; or in wastes removed from the site on FY01, ABP analysis during future groundwater monitoring is not necessary.

CLEANUP STRATEGY

The Part B permit will be modified in Sept 2005.

The groundwater monitoring will be funded under DPG-097.

DPG-037

LANDFILL, WEST OF DITTO TEC CENTER

SITE DESCRIPTION

DPG-037 is an inactive landfill located ~1,400 ft southwest of the Ditto Technical Center. Available data, including aerial photographs, indicated that DPG-037 is approximately 19 acres. Numerous soil mounds and depressions exist throughout the site, as well as several piles of ash and asphalt, a 5 ft deep trench, a small ordnance mound, and numerous trench and fill areas were used from the 1940s to 1975. Other waste and debris observed at DPG-037 include: test tubes, gas masks and filters, needles and syringes, animal bones, fire brick, plates, heat-treated glasswares, and chemical aprons. Previous investigation work has revealed waste is in contact with groundwater.

Included within DPG-037 are two small SWMUs-87 (landfill) and 89 (waste pile). SWMU-87 consists of a single backfilled trench (500 x 30 ft) and has been backfilled to approximately 2.5 ft above grade with a mixture of soil and debris. Metals, SVOCs, and DIMP were detected in soil during Phase I investigations. SWMU-89 consists of a 200 x 75 ft pile of asphalt with some bricks, a coal pile (25 ft diameter), and two 5-gallon buckets of tar. Warning signs were placed at the site in 1996. Groundwater monitoring has been conducted at DPG-037 since 1996. Low levels of VOCs have been detected, but do not appear to be migrating. Cone penetrometer and hydropunch groundwater investigation work was performed in FY01. Soil and landfill gas investigation work was performed in FY02.

This site was included in the ITR program. The ITR recommended a minimal vegetative cap that allows moisture to enter the landfill and applying risk-based principles to close the site in-place. As responded on December 14, 1999, Dugway does not concur. The water table is very shallow and the waste is currently in direct contact with groundwater. The shallow groundwater is saline. Vertical and horizontal migration of contamination in the groundwater has been characterized. In addition, Dugway is currently gathering evidence to support a variance from the closure requirements that would allow for a no-cap alternative to be implemented.

CLEANUP STRATEGY

Covering of the landfill trenches is planned for closure of this site. DPG is currently preparing a variance request for non-engineered cover.

STATUS

RRSE RATING: High

LEGAL DRIVERS: Consent Order

CONTAMINANTS:

SVOCs, VOCs, BNAs, DIMP, ABPs, Explosives, Metals

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	198905	199609
RFI/CMS.....	199609	200107
IRA.....	199610	199612
DES.....	199606	200108
CMI.....	200109	200605
LTM.....	200606	203606
RC expected: 200605		

DPG-039

LANDFILL NORTH OF AVERY

SITE DESCRIPTION

DPG-039 is an inactive landfill (4 acres) located approximately 2,300 ft northeast of the Avery Technical Center. Engineering drawings of the unit are not available, so dimensions given are based on field measurements. The small landfill covers an area that is approximately 300 x 600 ft and can be accessed from unimproved roadways. The disposal area, which consists of several unlined trenches, is excavated in native soil. Other features at the site are four soil mounds scattered in the vicinity of a concrete pad (60 x 15 ft) whose original purpose is unknown. Reportedly, hazardous materials were disposed at the landfill during the 1950s to 1985.

An IRA of waste removal occurred in 1992. The DES for the cap was reviewed in March 2005.

CLEANUP STRATEGY

The site will be capped in summer 2005. LTM will follow.

STATUS

RRSE RATING: High

LEGAL DRIVERS: Consent Order

CONTAMINANTS: VOCs, BNAs, ABPs, Explosives, Metals

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	198605	199609
RFI/CMS.....	199609	200307
IRA.....	199205	199205
DES.....	200211	200307
CMI.....	200310	200509
LTM.....	200510	203509

RC expected: 200509

EVAPORATING POND @ AVERY FACILITY

SITE DESCRIPTION

Site consists of a 5,800 ft² evaporation pond with an asphalt liner and the associated liquid waste disposal and treatment system. This includes treatment tanks and the buried pipes associated with the operations. The site is located in the Avery technical area and was active from the early 1950s to the 1960s. Reportedly, radioactive decontamination water effluent discharged into the pond.

DPG-184 (Air Filter System, Bldg 1004) was combined with this site in 2003.

A Phase II RFI is underway. The field work is scheduled for June 2005.

CLEANUP STRATEGY

Complete the RFI (expected approved in Sept 2006) and CMS.

This site is expected to be included in the FY07 PBC award.

The pond and USTs are expected to be removed.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Metals, VOCs, SVOCs, Radionuclides

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200601
DES.....	200610	200709
CMI.....	200610	200809

RC expected: 200809

DPG-043

OLD LANDFILL FOR ENGLISH VILLAGE

SITE DESCRIPTION

DPG-043, known as the Old English Village Landfill, is a 70-acre area located ~1.5 miles south of English Village. This site is located over a productive high quality groundwater source. There are numerous gravel and dirt roads throughout the site, including two east-west roads that run along the northern boundary and approximately through the center of the site. DPG-043 was in operation from the early 1950s to 1987. It was used to manage miscellaneous refuse from all DPG areas and was the primary landfill for English Village. Other major waste generators included the Avery, Ditto, and Baker areas, with significant minor contributions from the Carr Facility and Michael Army Airfield. Due to the nature of services and testing at these facilities, it is possible that hazardous wastes have been disposed at this landfill. Typical materials included biological and chemical wastes, oil cans, test area refuse, fly ash from the Baker incinerator and sludge from the English Village Gas Station Sump. Surface features of the landfill include numerous linear trenches, soil and debris piles, with some protruding sanitary and household waste. In addition there is a large pile of asphalt rubble, and an asbestos disposal area located within the landfill.

Warning signs were placed at the site in 1992. The groundwater monitoring conducted since 1996 at DPG-043 has detected no significant contamination. In 2003-4, construction debris (40,000cy) from DPG-042 was relocated to DPG-043. The site was capped in winter 2004.

This site was included in the ITR program which recommended that the site be monitored with lysimeters and secondly that risk-based closure be applied to this site with no further action. PDG did not concur with these conclusions. The basis for this was lysimeters would not produce enough sample to analyze and there would be a need for too many since each individual trench would be subject to lysimeter installation. In addition, the Risk-based closure proposal does not comply with Utah Administrative Code R315-101 which requires covering or removal of waste. Risk assessment would be performed, however, on areas not covered by imported fill or other cover types (e.g. GCL).

CLEANUP STRATEGY

The cap will be maintained.

Groundwater monitoring will be addressed under DPG-044.

STATUS

RRSE RATING: High

LEGAL DRIVERS: Consent Order

CONTAMINANTS:

VOCs, SVOCs, Metals

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	198905	199609
RFI/CMS.....	199609	200309
IRA.....	199205	199205
DES.....	199808	200309
CMI.....	200109	200408
LTM.....	200510	203410

RC: 200408

DPG-044

OLD STP FOR ENGLISH VILLAGE

SITE DESCRIPTION

Abandoned sewage treatment works located in the English Village area, active 1952 to 1964. DPG-044 and 068 have been combined in the Dugway RCRA Part B permit due to their proximity and interrelationship. The treatment works includes a treatment plant, a digester, a clarifier, buried piping, and two sludge-drying beds. Formerly, the system was comprised of a sedimentation basin, a chlorination contact chamber, an evaporation/oxidation pond, and a digester. After digestion, sewage was transported via two open ditches approximately two miles to the evaporation pond.

These ditches were not sampled during Phase I activities. In FY03, the Phase II RFI field work was completed and the digester and its contents were removed. Low levels of pesticides are present in the ditch and are presumed to be residue of intended use.

CLEANUP STRATEGY

Complete the Phase II RFI report (expected to be approved in May 2005 with permit modified in Sept 2005). The groundwater monitoring for the English Village GMA will be funded under this site.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

VOCs, SVOCs, Metals, Pesticides

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200508
LTM.....	200510	203509
RC expected: 200508		

DPG-051

EVAPORATION POND NEAR DTC

SITE DESCRIPTION

DPG-051, constructed in 1972, is a shallow impoundment used to dispose of liquids from the test chamber and decontamination system, located southwest of the Carr Facility. The unit was last used in the 1980s, after which it was retrofitted to include a double liner and a leachate detection system. However, after retrofitting the unit, the Army determined that pond operations would cease. The unit received decontamination solutions from the neutralization of chemical agents that were used in the test chamber, including GA, GB, GD, HD, HL, L, VX, CK, and AC. The decontamination solutions may have contained sodium hydroxide, HTH, sodium hypochlorite, soda ash, monoethanolamine, and/or nitric acid. In addition, site control measures (i.e., warning signs and fence) were placed at the unit. The site was used until 1987, and measures 150 x 150 x 15ft deep.

STATUS

RRSE RATING: Medium
LEGAL DRIVERS: Consent Order
CONTAMINANTS:
VOCs, BNAs, ABPs, Metals
MEDIA OF CONCERN:
Soil, Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	199111	199609
RFI/CMS.....	199609	200308
IRA.....	198802	200103
DES.....	200308	200603
CMI.....	200603	200612

RC expected: 200612

Groundwater monitoring has been conducted at DPG-051 since 1996. In response to a 1998 Notice of Violation, the observation sump was emptied and decontaminated in Feb 2001. Hydropunch work was then completed in August 2001 to assist in evaluating the existing groundwater monitoring network. DSHW and DPG agreed not to install additional groundwater wells at this time. Soil and groundwater have not shown significant contamination.

CLEANUP STRATEGY

The final investigation report is expected in Oct 2005. Removal/backfill of the facility is expected as a final action.

WASTE BURIAL SITES (EAST SE OF CARR)

SITE DESCRIPTION

This site is a burial site in the Carr area; it covers 2-acres, and was active during the 1940s. The disposal area includes seven backfilled trenches, several soil mounds, a former German bomb storage area, and munitions debris. Surface debris was removed under a base contract in 1993. The debris removed consisted of empty WWII German bombs, empty 55-gallon fog oil drums, munition debris, and miscellaneous debris.

Approximately 6.5 tons of empty drums were hauled to the DRMO, 25 tons of munition debris and empty bombs were disposed as FY99 waste at the Grassy Mountain facility, and the remaining 4 tons of debris was taken to the DPG landfill. Phase I activities were deferred upon discovery of a white phosphorous round and an HE round, which were subsequently destroyed on-site. Chemical agent (mustard) and ABPs were detected in soil. TCE was detected in groundwater.

The principal groundwater concern at this site is migration of chlorinated solvent contamination to a deeper aquifer.

CLEANUP STRATEGY

Finalize the Phase II RFI (draft final was submitted to DPG in Feb 2005, expected approval Oct 2005) and CMS.

This site is expected to be included in the FY05 PBC award.

Capping of 6 areas is expected. LTM will follow.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Chemical Agents, ABPs, TCE, UXO

MEDIA OF CONCERN:

Groundwater, Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200510
IRA.....	199305	199310
DES.....	200510	200607
CMI.....	200609	200612
LTM.....	200612	203711
RC expected: 200612		

DISPOSAL AREA(S), EAST OF CARR FACILITY

SITE DESCRIPTION

This site is in the Carr area, and is approximately 9.5-acres. It was active from the 1960s to 1970s. The disposal area consists of three unlined backfilled trenches reported to contain chemical agent-contaminated materials, including munitions.

Phase I activities were deferred upon discovery of UXO scattered on the surface. During the Phase II RFI, angle borings were used. The surface and sub-surface soil does not show a risk and meets clean closure requirements. The Phase II RFI report was approved in Oct 2003.

CLEANUP STRATEGY

The draft final CMS was submitted to DSHW in Aug 2003.

This site is expected to be included in the FY05 PBC award.

Capping and LTM is expected.

The groundwater will be monitored under the Carr GMA (funded under DPG-061).

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200309
DES.....	200510	200604
CMI.....	200604	200709
LTM.....	200709	203709

RC expected: 200709

DPG-055

3X DISPOSAL SITE, E OF CARR FACILITY

SITE DESCRIPTION

DPG-055 is an inactive disposal site located approximately 1 mile southeast of the Carr Facility. The site consists of two parallel trenches, each with approximate surface dimensions of 400 x 70 ft. The site was used from 1943 to 1985. The waste trenches were constructed by excavating elongated trenches of unknown depths into the native soil. Wastes were placed in the trenches and then covered using the excavated soil from the immediate area. Wastes disposed of at DPG-055 include items previously contaminated with chemical agents: Sarin (GB), mustard (HD), and nerve agent (VX), drums of DMP/polymers, and residues from agent decontamination procedures.

Warning signs were placed at the site in 1992. Groundwater monitoring has been conducted at DPG-055 since 1996. Additional soil investigation was completed in Dec 2002. High levels of TCE were detected in soil vapor. A TCE plume has been found in groundwater.

STATUS

RRSE RATING: High
LEGAL DRIVERS: Consent Order
CONTAMINANTS: TCE, SVOCs, ABPs, Metals, Explosives
MEDIA OF CONCERN: Soil, Groundwater
COMPLETED IRP PHASE:

PHASES	Start	End
RFA.....	198601	198802
CS.....	198905	199609
RFI/CMS.....	199609	200602
DES.....	200602	200609
CMI.....	200510	200709
LTM.....	200709	203709

RC expected: 200709

CLEANUP STRATEGY

The final field activities report is expected to be approved in Oct 2005.

This site is expected to be included in the FY06 PBC award.

Capping of waste material may be required for closure of this site. LTM will be needed for cap maintenance.

The groundwater will be monitored under the Carr GMA (funded under DPG-061).

STORAGE SITE, E OF CARR FACILITY

SITE DESCRIPTION

This is a 10.4-acre site of waste piles located in the Carr area, active during the 1970s. The disposal area consisted of eight detonation craters, a backfilled trench (with another trench suspected), as well as former piles of debris. There is an additional trench located across the road.

In 1993, removal of 145 tons of debris (under base contract) consisted of 105-mm shell-casings, propellant charge cans, and lids were taken to the DRMO, as well as miscellaneous debris taken to the DPG landfill. ABPs were detected in soil samples from four detonation craters. A nearby pile of illumination flare debris was not identified in the RFA, but is being investigated in conjunction with this site. The illumination flare debris is referred to as DPG-056B. Test pitting in the area led to the discovery of buried waste. A Phase II RFI is underway.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Chloroform, ABPs, Explosives

MEDIA OF CONCERN:

Groundwater, Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200510
DES.....	200510	200601
CMI.....	200601	200701
LTM.....	200701	203709
RC expected: 200701		

There is a chloroform plume in the groundwater. Explosives and ABPs have been detected in the soil.

CLEANUP STRATEGY

Complete the RFI (expected to be approved in July 2005 with permit modification in Sept 2005) and CMS (final completed as part of PBC).

This site is expected to be included in the FY05 PBC award.

Nine areas are expected to be capped, followed by cap maintenance.

The groundwater will be monitored under the Carr GMA (funded under DPG-061).

DPG-058

EVAPORATION POND @ CARR FACILITY

SITE DESCRIPTION

DPG-058 is an inactive surface impoundment (used from 1965 to 1986) which had previously been used for evaporative disposal of decontaminated toxic waste solutions generated by various facilities, including the Toxic Agent Transfer Building in the Carr Facility. The original pond was a shallow impoundment (approximately 150 x 150 x 4ft deep) at the bottom of a large excavated area. The unit was last used in 1986, after which it was retrofitted to include a double liner and a leachate collection system. The retrofitted unit was never used.

Warning signs and fencing were placed at the site in 1988. Groundwater monitoring has been conducted at DPG-058 since 1996. In response to the 1998 Notice of Violation, the observation sump was emptied and decontaminated. Additional soil and groundwater investigation activities were completed in Sept 2004.

This site was included in the ITR program. The ITR recommended a more structured approach to establish DQOs during future investigation work. Dugway concurs with this recommendation. A technical planning meeting was held prior to developing the work plan for additional site characterization. The ITR also recommended that the site investigation not proceed until standard operating procedures for possible/probable agent contamination areas are developed. Dugway concurs and has developed appropriate procedures.

CLEANUP STRATEGY

The field activities report is expected to be approved in Nov 2005. This site is expected to be included in the FY06 PBC award.

The expected CMI includes bringing the pond up to grade and capping. Cap maintenance will follow.

The groundwater will be monitored under the Carr GMA (funded under DPG-061).

STATUS

RRSE RATING: High
LEGAL DRIVERS: Consent Order
CONTAMINANTS:
VOCs, BNAs, ABPs, Metals
MEDIA OF CONCERN:
Soil, Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	199111	199609
RFI/CMS.....	199609	200503
IRA.....	198802	200103
DES	200309	200609
CMI.....	200610	200709
LTM.....	200709	203601
RC expected: 200709		

CHEMICAL STORAGE AREA @ CARR FACILITY

SITE DESCRIPTION

This is a 30-acre L-shaped storage area located in the Carr area, active from the 1950s to 1980. The site is comprised of three separate storage areas, which include numerous concrete and asphalt pads and several former buildings, as well as the sewer system in Carr. The site was reportedly used to store a number of hazardous and non-hazardous materials, and as a transfer point for chemical agents used in open air testing. This site is no longer used for storage, the drums have been removed.

The waste line identified as DPG-150 crosses this site and appears to be the source of the chlorinated solvent.

A Phase II RFI is underway. Chlorinated solvents and mustard have been detected in the soil. Chlorinated solvents have been detected in the groundwater.

This site was included in the ITR program. The ITR recommended that additional groundwater contamination assessment be performed. Dugway agrees with this recommendation and is in the process of reviewing data collected under the groundwater technical memorandum and completing follow-up activities to complete the groundwater assessment in the Carr area.

CLEANUP STRATEGY

Additional sampling is planned for spring 2005. Finalize the RFI report (expected Oct 2006).

This site is expected to be included in the FY06 PBC award.

Soil removal and bioremediation are expected.

The groundwater will be monitored under the Carr GMA (funded under DPG-061).

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: VOCs, Metals, ABPs, CWA in Red Dirt Sample

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200510
DES.....	200510	200609
CMI.....	200610	200809
RC expected: 200809		

CONTAMINATED SOIL @ NEW CARR FACILITY

SITE DESCRIPTION

This is a 1.1-acre former drainfield and dry well located in the Carr area, active prior to 1986. Contamination at this site was first noted during construction of Buildings 3242 and 3244. In 1986, over 600cy of HD-contaminated soil was excavated and moved to Pad 7 (DPG-059) under base contract. Ultimately the soil was disposed of at the Grassy Mountain facility.

During the Phase II, a large plume of TCE (7 ppm) was discovered in the groundwater. The plume appears to be migrating cross-gradient. Additional groundwater investigation work was completed in Dec 01 to better define the extent of groundwater contamination.

CLEANUP STRATEGY

A RFI (expects final to be approved Oct 2005) and CMS will be completed.

This site is expected to be included in the FY05 PBC award.

SVE and bioremediation may be considered.

The groundwater monitoring for the Carr GMA is funded under this site.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Chemical Agent HD, VOCs

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200510
DES.....	200510	200609
CMI.....	200610	200809
CMI(O)	200809	200909
LTM.....	200910	203909
RC expected: 200909		

OLD FRIES PARK SEWAGE LAGOON (EPIC-3D)

SITE DESCRIPTION

This site consists of a former Imhoff tank, sludge drying beds, and open discharge ditch located in the English Village area, active from the 1950s through early 1960s. The system was used in the treatment of wastewater from the Fries Park area. The locations of the site structures were determined as part of the Phase II investigation.

Soil sampling under the Phase II RFI was conducted in 2001. Low levels of VOCs were detected in the lagoons. The final RFI report was approved in Feb 2005.

CLEANUP STRATEGY

The permit will be modified in Sept 2005.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

VOCs, Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200509

RC: 200509

EX-ASPALT PILE LITTLE GRANITE MTN**SITE DESCRIPTION**

This is a 2-acre site of a waste asphalt pile located in the Little Granite Mountain area, active from 1950 through the present. The site consists of an asphalt pile, which includes a 55-gallon drum, and a tar disposal area. Widespread staining is evident in surface soils throughout the site. A majority of the area is devoid of vegetation. The area is believed to have been an ammunition staging area during National Guard exercises.

DSHW recommended removal and disposal of wastes and contaminated soils, with confirmation sampling. The asphalt was removed in 2002.

A small amount of tar was removed in March 2005.

CLEANUP STRATEGY

The final RFI and NFA report is expected to be submitted in spring 2005.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: PAHs, TPH

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200507

RC: 200507

WASTE PILE (SW OF LITTLE GRANITE MTN)

SITE DESCRIPTION

This is a 30-acre waste pile site in the Carr area, also known as “Old Lincoln Highway Landfill”, active in various areas from the 1940s through 1970. Due to their proximity and similarities, DPGs-057, 079, 080, & 106 have been combined into one site, DPG-079. The disposal area consists of numerous open trenches, backfilled trenches, soil mounds, debris piles, areas of stained soil, and a disturbed area. The area was used for disposal of wastes from chemical testing activities. The disposal area is also known to be within an inactive chemical agent (HD) mortar impact area. Biological warfare simulant (BG) bomblets are also present at the site.

To date, Phase II RFI activities have included angle borings under disposal trenches, surface soil sampling, direct push groundwater sampling, lithologic profiling, and installation of monitoring wells. In an attempt to expedite the investigation, DSHW and EPA have identified this site as an Environmental Indicator (EI) due to its location in a potential groundwater recharge zone. DPG and DSHW have partnered in developing the site characterization approach. There are high levels of chlorinated solvents in groundwater in an otherwise productive aquifer.

This site was included in the ITR program. The ITR recommended the establishment of site objectives and remediation drivers before performing additional work. Dugway agrees with this recommendation and applied data obtained prior to receiving the ITR recommendations to determine additional site characterization needs. The ITR also recommended the Army take the lead in developing protocols for sampling and analyzing biological warfare agents. Dugway agrees with this recommendation and has taken steps in the interim to address immediate needs.

CLEANUP STRATEGY

Finalize RFI (expect final approval in June 2005) and CMS.

This site is expected to be included in the FY05 PBC award.

The RA may include: soil and drum removal and capping.

The groundwater will be monitored under the Carr GMA (funded under DPG-061).

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

TCE, Metals, Suspected ABPs

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200510
DES.....	200510	200601
CMI.....	200601	200609
LTM.....	200610	203609
RC expected: 200609		

BURNING AREA, EAST OF CARR FAC (EPIC-10E)**SITE DESCRIPTION**

DPG-090 is composed of three elongated mounds within an oval-shaped area approximately 800 x 400 ft wide. The site was active from the early 1960s to 1985. This unit was used for disposal of range clearance materials and burning of wastes from the Carr Facility and the ranges. Wastes consisted of ordnance, propellants, decontamination solutions, debris collected during range-clearance activities, illumination rounds, scrap metal, and miscellaneous 3X debris. Materials were burnt upon placement in pits. In 1994, scattered surface debris was hauled to a gondola (roll-off bin) at DPG-194 and then disposed off-site. No open detonation took place at the site.

Warning signs were placed at the site in 1992. Groundwater monitoring has been conducted at DPG-090 since 1996. No significant contamination has been detected. Slant borings were conducted under the trench in FY02, no significant contamination was detected. The waste in the trenches has not been sampled. Data gap sampling took place in FY03.

STATUS

RRSE RATING: High

LEGAL DRIVERS: Consent Order

CONTAMINANTS:

VOCs, BNAs, ABPs, Pesticides, PCBs, Explosives, Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199107	199609
RFI/CMS.....	199609	200307
IRA.....	199205	199205
LTM.....	200510	203509

RC expected: 200509

CLEANUP STRATEGY

The remedial action plan report is expected to be final in Aug 2005.

Capping of three areas is planned (funded prior to FY06).

The groundwater will be monitored under the Carr GMA (funded under DPG-061).

DPG-097 DRAINFIELD & DECONTAMINATED PAD (AVERY)

SITE DESCRIPTION

This is a 2.5-acre abandoned drainfield located in the Ditto area, active from 1940 to 1959. A decontamination pad was reportedly associated with the drainfield, but is no longer present. The drainfield is located adjacent to the runway at Michael AAF, where aircraft decontamination activities are known to have taken place.

Arsenic was the only contaminant detected above the screening level during Phase I activities, and is believed to reflect higher background levels in the area. A chlorinated solvent plume was discovered during Phase II RFI activities.

CLEANUP STRATEGY

The draft final RFI report will be submitted in Dec 2005. The final approval is expected in Aug 2006.

An in situ bioremediation pilot study is being conducted. Removal of the drain pipe and source soil may be needed. This CMI is expected to be included in the FY07 PBC award.

All groundwater for the Ditto GMA will be addressed under this site (DPG-036, 037, 038, 039, 041, 097, 133, 163 177).

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

TCE, Arsenic

MEDIA OF CONCERN:

Groundwater, Soil

PHASES	Start	End
RFA.....	199707	199111
CS.....	199210	199610
RFI/CMS.....	199610	200510
IRA.....	200310	200709
DES.....	200610	200701
CMI.....	200610	200809
LTM.....	200809	203710
RC expected: 200809		

DPG-098 PIPELINE EXCAVATION VICINITY OLD IGLOOS @ CARR FACILITY

SITE DESCRIPTION

Site history depicts red stained soil along a 490-ft section of underground piping leading from the Carr facility to an old igloo storage area. Contaminated soil was discovered during a pipeline excavation in 1986. Agents and ABPs were detected in samples obtained at the time of the 1986 excavation. Excavated soils were taken to DPG-059 and subsequently disposed in 1998.

During Phase II RFI investigation activities, soil borings were completed in the area thought to be the pipeline excavation. Undisturbed soil was encountered. Additional personnel interviews, site reconnaissance, and aerial photo interpretation were conducted to determine the correct site location. Chloroform was detected (below action levels) in groundwater.

CLEANUP STRATEGY

The draft final RFI (requesting no further action) is expected to be submitted to DSHW in Aug 2005. The RFI report is expected to be approved in April 2006.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

ABPs, Metals, VOCs, SVOCs

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200604

RC expected: 200604

DPG-114

OLD GPI-3 TEST SITE (NW V-GRID)

SITE DESCRIPTION

Former Granite Peak Installation (GPI-3) Test Site of uncertain size, purpose, and time of usage, located in the northwestern portion of V-Grid. The site consists of biological laboratory building foundations, sewer lines, USTs, surface debris, and a water-contained pit with soil mounds on each side. Two waste piles located southwest of the test site, originally identified as DPG-202, have been incorporated into DPG-114 due to their proximity. The waste piles were noted to contain wood and scrap metal.

The Phase II RFI is underway (field work is planned for Dec 2005).

CLEANUP STRATEGY

Complete the Phase II RFI (draft final submitted in Aug 2006, expect final approval in March 2007).

This site is expected to be included in the FY07 PBC award.

Soil and debris removal and septic system abandonment is expected.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Bio and Lab Waste

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200612
DES.....	200701	200709
CMI.....	200710	201009
RC expected: 201009		

DISPOSAL PIT, X-RAY RD 1 MI S OF BLDG T9490**SITE DESCRIPTION**

This is a 0.2-acre barren disposal pit is located in the All Purpose Grid area, and the active dates are unknown. The disposal area consists of a pit that had formerly contained miscellaneous debris, including scrap ordnance, wire, pipe, buckets and lumber. It is possible that propellants and items contaminated with chemical agent were disposed of at this site.

Observations have indicated that there also may be backfilled trenches located at the site.

Approximately 25-tons of surface debris were removed under base contract in 1993 and disposed of at DPG landfill. The debris consisted of an old icebox, electrical wiring, sand-filled propellant charge cans, lumber, pallets, rubber tiring, concrete, and metal posts. Some debris remains, however.

No significant contamination was detected, however, the waste has not been sampled. The final RFI was approved Sept 2004.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200510
IRA.....	199301	199310
DES.....	200510	200601
CMI.....	200601	200609
LTM.....	200610	203609

RC expected: 200609

CLEANUP STRATEGY

The permit will be modified in Sept 2005.

This site is expected to be included in the FY05 PBC award.

Soil cover and limited debris removal is planned. Cover maintenance will be needed.

The groundwater will be addressed under the Downrange GMA (funded under DPG-197).

TEST VAT (1940-1050S) (EAST OF V-GRID)**SITE DESCRIPTION**

This is a 0.3-acre site of an aboveground concrete tank located near the perimeter of V-Grid in the All Purpose Grid area, active from the 1940s to 1950s. Tank dimensions are approximately 20 x 40 x 16 ft high. The vat was reportedly used for testing of flares, munitions, and other chemical agent tests. The concrete floor is stained and contains debris, including spent shell casings, white crystals or powder and animal bones. Debris is scattered outside of the vat.

Explosives and ABPs were detected in soils sampled during the Phase I investigation. The Phase II RFI field work was completed in FY03. The final RFI report was approved April 2005.

CLEANUP STRATEGY

This site is expected to be included in the FY05 PBC award.

Removal of the concrete vat and contaminated soil is expected.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

DIMP, Explosives

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200510
DES.....	200510	200601
CMI.....	200601	200709

RC expected: 200709

HWWHA-3 (AIRCRAFT MAINT-SHOP WASTES)**SITE DESCRIPTION**

This is an area outside the fenced storage building in the Avery Area near Micheals Army Airfield (west of the hanger). This area was used for storage of wastes, most likely aircraft maintenance waste. A new storage facility was built in 1988, which is now used for this storage.

During Phase II activities, a groundwater plume (high levels) of solvents was detected. The source appears to be past aircraft maintenance activities. No credible source has been identified in the soil. The groundwater plume appears to be stable.

CLEANUP STRATEGY

Finalize the RFI report (final approval expected May 2006). Complete a CMS. NFA for soil is expected.

The groundwater will be addressed under Ditto GMA (funded under DPG-097)

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Solvents (TCE, PCE)

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200605

RC expected: 200605

DPG-150

WASTE LINES BLDG 3445 CARR

SITE DESCRIPTION

DPG-150 has been renamed and redefined to investigate the piping leading from Bldg 3445 to DPG-058. Previous site descriptions identified the site as a portion of an active facility used to manage wastes generated in Bldg 3445. That system will be evaluated when the associated facility is closed. DPG-150 is now being investigated as the lines leading from Bldg. 3445 to DPG-058.

Phase II RFI is underway.

CLEANUP STRATEGY

Additional sampling is planned (scheduled for Aug 2005). Finalize the RFI report.

This site is expected to be included in the FY07 PBC award.

Removal of the pipelines and soil is expected.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

CWA, VOCs, ABPs

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199610	200605
DES.....	200610	200709
CMI.....	200710	200909

RC expected: 200909

DPG-154

WASTE LINES AT DTC, CARR

SITE DESCRIPTION

DPG-154 has been renamed and redefined to investigate the piping leading from Defense Test Chamber (DTC) to DPG-051. Previous site descriptions identified the site as a portion of an active facility used to manage wastes generated in DTC. That system will be evaluated when the associated facility is closed. DPG-154 is now being investigated as the lines leading from DTC to DPG-051.

Phase II RFI activities are currently being implemented.

CLEANUP STRATEGY

Additional sampling is planned (scheduled for Sept 2005). Finalize the RFI report.

The pipes are expected to be closed in place.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

VOCs, SVOCs, CWA, ABPs

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199305
RFI/CMS.....	199906	200608
RC expected: 200608		

DPG-163

FIRE TRAINING AREA

SITE DESCRIPTION

DPG-163 is located in an open area (400 x 300 ft) east of the Fire Department and north of Tucker Street at Ditto. The site consists of a former fire training pit, a former fuel drum storage area, and a former fuel storage tank site (AST) that were used from 1978 to 1986. During its period of operation, staged metal drums were cut in half longitudinally and arranged in the shape of an airplane and then used to conduct fire training exercises. In 1986, the pit was backfilled, regraded, and covered with gravel. The AST was eventually relocated off-site.

Warning signs were placed in 1992. Low levels of solvent contamination were detected in the soil and groundwater.

CLEANUP STRATEGY

The final removal and closure report is expected in Sept 2005.

STATUS

RRSE RATING: High

LEGAL DRIVERS: Consent Order

CONTAMINANTS:

TPH, VOCs, PAHs, Pesticides

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199001	199009
CS.....	199111	199609
RFI/CMI.....	199609	200210
IRA.....	199205	199205
DES.....	200210	200212
CMI.....	200212	200509

RC: 200509

DPG-168

CARR WASH RACK

SITE DESCRIPTION

Roofed and bermed (on three sides) concrete pad of 35 x 20 ft, located at Carr facility (Bldg 3257). Engineering drawings of the unit indicate its construction in 1952. The unit was initially used as a mix-and-transfer facility for chemical agent and agent simulant, and later was used as a wash rack for agent contaminated vehicles. According to DPG personnel, red-stained soils and discharged liquids have been observed in the area. A dry well has been identified at this site. However, DPG has determined that the well is used to drain water supply lines and not to dispose of wastes. The site was not used after the 1980s.

Warning signs were placed on the site in 1992.

Sampling has detected metals in the soil. The concrete pad was demolished and some soil was removed in the summer 2004. Additional soil removal was completed in April 2005.

CLEANUP STRATEGY

A closure report will be completed (expected final approval in Feb 2006).

STATUS

RRSE RATING: High

LEGAL DRIVERS: Consent Order

CONTAMINANTS: ABPs, Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199001	199009
CS.....	199111	199609
RFI/CMS.....	199609	200006
IRA.....	199205	199205
DES.....	200006	200212
CMI.....	200212	200602
RC expected: 200602		

BLDG 2006 BAKER AREA – BZ CONTAMINANT**SITE DESCRIPTION**

This is a 1,200 ft² building located in the Baker area, built in 1961. It was used for decontamination of agent-contaminated vehicles and equipment. Waste generation amount and date operations ceased are unknown. Current use is as a storage facility, not for BZ operations. Floor drains route liquid through two sand traps prior to discharge into the sewer.

One sample was taken from each sand trap and numerous VOCs, SVOCs, PAHs, and metals were detected. A Phase II RFI is underway. A Source Removal Investigation and Voluntary Interim Measures Work Plan were completed. The waste was removed in FY03. No significant contamination was detected.

The final risk-based residential RFI was approved in Feb 2005.

CLEANUP STRATEGY

The permit will be modified in Sept 2005.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Lead,
Benzo(a)anthracene

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199207	199307
CS.....	199207	199610
RFI/CMS.....	199610	200509

RC: 200509

DPG-173

OLD BATTERY SHOP DITTO AREA

SITE DESCRIPTION

This is a 0.75-acre site of two former lead acid battery buildings located in the Ditto area, active 1942 to 1962. The buildings reportedly burned down and only the concrete foundations (~150cy) remain. Two debris piles have also existed on the site, including approximately 6 tons of asphalt and stained soil that was removed under base contract. The debris consisted of dark stained soil, asphalt and a white powdery material.

VOCs, SVOCs, and metals have been detected in surface and shallow sub-surface soils.

CLEANUP STRATEGY

Additional sampling is planned for spring 2005.
Limited soil removal with confirmatory sampling is expected (funded in FY05).

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Lead, PAHs

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199207	199307
CS.....	199207	199610
RFI/CMS.....	199610	200609

RC expected: 200609

DPG-177 OLD DRY CLEANING SHOP/SEWER SYSTEM DITTO

SITE DESCRIPTION

This is a 5,600 ft² laundry building located in the Ditto area, active from the 1950s to 1970s. Bldg 4229 was formerly used to clean protective clothing worn in the laboratories and during field tests. However, Bldg 4229 is no longer used for dry cleaning.

A soil gas survey was performed and detected TCE and PCE in an area near the reported location of the building's sewer line. Based on that information, the site was expanded as the contamination has migrated through the Ditto sewer system.

A Phase II RFI is underway. The Phase II RFI is considering the entire sewer system at Ditto. Other buildings in Ditto, such as the photo building and the chemical laboratories, may have also contributed to sewer system contamination. A Source Removal Investigation and Voluntary Interim Measures Work Plan is in place to replace broken sewer line sections and contaminated soil and to complete the site characterization.

Groundwater is contaminated with chlorinated solvents.

CLEANUP STRATEGY

A limited removal and additional sampling is planned in May-Jun 2005. The final approved RFI is expected in Sept 2006.

This site is expected to be included in the FY06 PBC award.

SVE and/or air sparging may be needed to address the soil source area.

The groundwater will be addressed under the Ditto GMA (funded under DPG-097).

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: TCE, PCE

MEDIA OF CONCERN:

Groundwater, Soil

PHASES	Start	End
RFA.....	199207	199307
CS.....	199207	199610
RFI/CMS.....	199610	200609
IRA.....	200109	200209
DES.....	200510	200609
CMI.....	200610	200709
CMI(O)	200710	201209
RC expected: 201209		

OLD BIO LABORATORY WEST OF CARR FAC

SITE DESCRIPTION

This is a 4-acre site of former biological laboratory complex located in the Carr area, which was active from the 1950s to 1960s. The site consists of six concrete building foundations, a sewer system, a former wastepile site, and an earthen bunker. This area was formerly referred to as GPI-1, and was reportedly the site of biological simulant studies until it was razed in the mid-1960s.

VOCs, SVOCs, pesticides, and metals were detected in soils at the site; a Phase II RFI is recommended. Also at the site is DPG-105, a landfill (at least 0.4-acre) that had been active prior to the 1960s. The site consists of a partially backfilled trench (70 x 15 ft) and a drainage area. The trench was reportedly used for disposal of materials generated from the GPI-1 area, where crop warfare studies were performed. There is no evidence that biological agent wastes and/or residues were disposed of at the site; wastes visible in the trench include construction debris, scrap ordnance materials, laboratory glassware, and small animal cages. Only surface debris has been removed.

Phase II RFI is underway. Low levels of TCE have been detected in groundwater. The UST that held heating oil was removed in FY02. Investigations in FY03 discovered that the TCE plume is three times larger than previously believed.

CLEANUP STRATEGY

The Phase II RFI report will be completed (final approval expected Oct 2006).

This site is expected to be included in the FY07 PBC award.

Soil and debris removal and capping of a trench are expected.

The groundwater will be addressed under the Carr GMA (funded under DPG-061).

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Solvents, VOCs, SVOCs, Pesticides, Metals

MEDIA OF CONCERN:

Groundwater, Soil

PHASES	Start	End
RFA.....	199207	199307
CS.....	199207	199610
RFI/CMS.....	199610	200610
DES.....	200610	200709
CMI.....	200610	200809
LTM.....	200809	203809
RC expected: 200809		

B29 AIRCRAFT – WEST OF GRANITE PEAK

SITE DESCRIPTION

This is a 2.7-acre site of a partially buried B-29 fuselage and drum disposal area located west of Granite Peak, the active dates are unknown. Based on limited verbal evidence, the aircraft had reportedly been used during agent testing and may have been contaminated with agent. However, a representative of the US Aviation Museum concluded that the aircraft may have instead been subject to the overpressure of a nuclear explosion and landed at DPG. Also this area may be subject to Section 106 (historical/ archeological).

Decomposed fragments of drums are located in a small drainage ravine to the east of the aircraft. The source and contents of the drums appear to be a result of the decontamination of the aircraft.

A Phase II RFI is underway. A Source Removal Investigation and Voluntary Interim Measures Work Plan is in place to remove the remaining debris and possible contaminated soil and to complete the site characterization (planned for Aug-Sept 2005).

It is assumed that the aircraft will not pose a risk if recovered for a historic static display or parts.

CLEANUP STRATEGY

Finalize the RFI (final approval expected March 2007). The permit will be modified in Sept 2007.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199207	199307
CS.....	199207	199610
RFI/CMS.....	199610	200709

RC expected: 200709

DPG-185 OLD CHEMICAL LABORATORY - DITTO AREA (4165)

SITE DESCRIPTION

This is a 1-acre site of a chemical laboratory and storage area located in Ditto. A demolition in 1996 removed all structures except the foundation and buried waste lines. Contaminants suspected from previous lab activities include F999 wastes and solvents.

A source removal (pipelines and foundation) and investigation was completed in summer 2003 to complete site characterization. A UST was removed in FY03.

CLEANUP STRATEGY

The approval on the final NFA RFI is expected April 2005. The permit will be modified in Sept 2005.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

ABPs, Solvents, VOCs

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199207	199307
CS.....	199207	199610
RFI/CMS.....	199610	200509

RC: 200509

WASTE PIT – NORTH OF RISING SUN GRID

SITE DESCRIPTION

Waste pit and associated soil mound on 0.1 acre site located in the Tower Grid area, active dates unknown. The pit is two ft deep and approximately 30 ft in diameter. In 1993, approximately 10 tons of surface material was removed under base contract for disposal at DPG landfill. Some of the debris removed included spent projectiles, burnt 6-volt dry cell batteries, electrical wire, electrical junction boxes, scrap wood, and miscellaneous range debris. MEC is suspected at this site.

Prior investigations revealed several metals in soil that were detected well above background levels.

The final RFI was approved in Sept 2004.

CLEANUP STRATEGY

This site is expected to be included in the FY05 PBC award.

A soil cover of the area is expected. Cover maintenance is planned.

Groundwater will be addressed under the Downrange GMA (funded under DPG-197).

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199207	199307
CS.....	199207	199610
RFI/CMS.....	199610	200509
IRA.....	199307	199310
DES.....	200510	200601
CMI.....	200601	200701
LTM.....	200710	203709

RC expected: 200701

WASTE PIT – NORTH OF RISING SUN GRID

SITE DESCRIPTION

The waste pit and associated soil mound on the 0.7-acre site is located in the Tower Grid area, active dates unknown. The pit is six ft deep and approximately 25 ft in diameter. It is believed that range related wastes were disposed in the pit. In 1993, approximately 15 tons of debris was removed from the pit under base contract. Debris disposed at the DPG landfill included empty metal drums, canvas, wooden pallets, galvanized garbage cans, and miscellaneous rubbish. Salvageable drums were taken to the DRMO. For safety reasons, sampling was conducted only around the perimeter of the pit during the Phase I investigation.

The Phase II field work was completed in summer FY03. Limited sampling was conducted within the pit.

CLEANUP STRATEGY

Finalize the RFI (expect final approval in July 2005). Limited soil removal is expected.

Groundwater will be addressed under the Downrange GMA (funded under DPG-197).

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: ABPs, SVOCs

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199207	199307
CS.....	199207	199610
RFI/CMS.....	199610	200512
IRA.....	199301	199311
DES.....	200510	200605
CMI.....	200601	200701
RC expected: 200701		

DPG-192

DISPOSAL PITS WEST OF GRANITE

SITE DESCRIPTION

This 75-acre site is located in the Granite Mountain area, active from an uncertain time until the mid-1970s. The area was used to store toxic residue from open-air testing of agent munitions performed at Dugway prior to the 1969 ban. Two CONEX containers were utilized for this purpose. The site was also used during the demilitarization of 36,000 M55 rockets by burning in 61 open trenches. The 61 burn pits used in the demilitarization of M55 rockets were excavated and material removed between 1975 and 1976. The material was screened and transported to DPG-009 for detonation or neutralization, depending on contents.

A Phase II RFI is underway. ABPs, above drinking water standards, were detected in shallow groundwater. The soil is contaminated with explosives, ABPs, PCBs and metals.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

ABPs, Explosives, Metals, UXO, PCBs

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199207	199307
CS.....	199307	199610
RFI/CMS.....	199610	200609
DES.....	200610	200709
CMI.....	200610	200809
LTM.....	200809	203809
RC expected: 200809		

CLEANUP STRATEGY

Additional sampling is planned to better delineate the site (planned for Oct 2005). The final RFI is expected in May 2007.

This site is expected to be included in the FY07 PBC award.

Soil cover and cover maintenance is expected.

Groundwater will be addressed under the Downrange GMA (funded under DPG-197).

DECON PAD – WEST OF GRANITE MOUNTAIN

SITE DESCRIPTION

The elevated generator stand and staging area (approximately 15 x 20 ft) is located in the Granite Mountain area, active dates unknown. The pad area also includes a 20 x 20 ft section of marston matting on the ground which is partially covered with soil. Glass fragments were encountered in subsurface soil during Phase I activities.

Investigation and matting removal was completed in summer 2003. The matting was recycled. Additional field work was completed in Nov 2004.

CLEANUP STRATEGY

The final approval for the NFA is expected in Feb 2006. The permit will be modified in Sept 2006.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: ABPs

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199307	199508
CS.....	199307	199610
RFI	199610	200609

RC expected: 200609

DPG-194

BURIAL SITES, EAST OF CARR

SITE DESCRIPTION

This site consists of three separate sites (A, B and C) of three trenches located in the Carr area, believed to have been active during the 1940s. The trenches are suspected of containing chemical munitions. Partially buried debris, including miscellaneous metal scrap, bomb and incendiary fragments, and gas cylinder fragments were observed at all three trench sites. Substantial geophysical anomalies were detected at all three sites. Area B contains a 3 ft high soil mound and an area of purple-stained soil within the trench.

All three trenches have uncharacterized waste that has not been sampled. The final RFI was approved in Sept 2004. The permit was modified in Sept 2004.

CLEANUP STRATEGY

This site is expected to be included in the FY05 PBC award.

Soil cover of the three separate areas containing nine trenches is planned.

Groundwater will be addressed under the Carr GMA (funded under DPG-061).

STATUS

RRSE RATING: High

LEGAL DRIVERS:
Corrective Action

CONTAMINANTS: ABPs

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199307	199410
CS.....	199307	199610
RFI/CMS.....	199610	200512
DES.....	200510	200601
CMI.....	200601	200701
LTM.....	200701	203709
RC expected: 200701		

DPG-197 DISPOSAL PIT, OLD TARGET SITE, DOWNWIND GRID

SITE DESCRIPTION

This is a 0.5-acre site located in the Downwind Grid area, and the active dates are unknown. The site consists of a backfilled trench (100 x 7 ft), and a rectangular pad (100 x 20 ft) made of marston matting. The pad may have been used as a decontamination pad. Ordnance debris is scattered across the site.

A Phase II RFI is underway. A chlorobenzene plume (200 x 70 ft) has been detected in groundwater. The trench wastes have not been sampled due the risk of UXO related materials.

Removal of the matting and sampling was completed in summer 2003.

CLEANUP STRATEGY

Finalize the RFI (final approval expected in March 2006).

This site is expected to be included in the FY06 PBC award.

Soil cover and cap maintenance are expected.

The groundwater for the entire Downrange GMA will be funded under this site (DPG-002, 003, 006, 014, 017, 021, 023, 025, 115, 188, 192, 197, 213 & 215).

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

ABPs, Chlorobenzene

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199307	199404
CS.....	199307	199610
RFI/CMS.....	199610	200512
DES.....	200512	200609
CMI.....	200609	200709
LTM.....	200709	203709
RC expected: 200709		

DPG-199

OLD OB/OD EAST OF SWMU 17

SITE DESCRIPTION

This is a 100-acre site OB/OD area located in the Tower Grid area, active from the 1950s to 1970s. The site consists of a large area of disturbed ground, at least 20 OB/OD pits, debris piles, miscellaneous fragmentation, stacks of scrap munitions, and an open trench (70 x 20 x 8 ft deep).

The site was added to the RFI after the RFA; no historical information regarding the site was available during the Phase I investigation. IRAs ranging from 1996 to 1998 consisted of site control (i.e., warning signs) and waste removal. TNT is present on the surface of the site. The final RFI was approved in Feb 2005.

This site was included in the ITR program. The ITR recommended mapping the relative densities of high explosive nuggets, shrapnel fragments, and other contamination to evaluate the acute hazards at the site. Dugway agrees with this recommendation and had plans inplace to implement this characterization prior to the ITR recommendation. The ITR also stated that Dugway should resolve with regulators the best way to determine chronic risks at the site, but provided no recommendation. Dugway responded with an explanation of how the analytical data being collected will be used to assess chronic risks.

CLEANUP STRATEGY

This site is expected to be included in the FY06 PBC award.

RA may include: UXO surface removal, backfill 14 pits and the ponded area, cap one area, incineration of the TNT-contaminated soil and/or rerouting the surface drainage.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Explosives

MEDIA OF CONCERN:

Soil, Surface Water

PHASES	Start	End
RFA.....	199307	199410
CS.....	199307	199610
RFI/CMS.....	199610	200510
IRA.....	199609	199806
DES.....	200510	200709
CMI.....	200611	200808
LTM.....	200809	203809
RC expected: 200808		

DPG-200

BURIAL SITE, SOUTHEAST OF CARR

SITE DESCRIPTION

This is a 0.7-acre burial site located in the Carr area, active from 1940s to 1960s. The site consists of two backfilled trenches (each approximately 100 x 20 ft), two soil mounds, and four metal drums.

Munitions and drums were visible in the trenches during Phase I activities. No information regarding past uses of the site was available during the Phase I investigation. The wastes have not been sampled due to UXO concerns. The Phase II RFI was approved in Oct 2003. The draft final CMS was submitted to DSHW in July 2003.

CLEANUP STRATEGY

This site is expected to be included in the FY05 PBC award.

STATUS

RRSE RATING: High

LEGAL DRIVERS:
Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199307	199512
CS.....	199307	199610
RFI.....	199610	200411
DES.....	200510	200601
CMI.....	200601	200701
LTM.....	200701	203709
RC expected: 200701		

Repair soil cover and fencing of the site is planned. Cover maintenance will follow.

The groundwater will be addressed under the Carr GMA (funded under DPG-061).

DPG-201

CAMEL'S BACK CAVE

SITE DESCRIPTION

This is a 1-acre site of a cave located in the Tower Grid area, active during 1945 to the 1950s. The site consists of a two-chambered cave connected by a man-made tunnel. The cave was reportedly used to study the effects of chemical weapon systems on tunnel fortifications. Numerous chemical weapons were tested at the site; munitions fragments, smoke canisters, wiring, scrap wood, and other debris is scattered across the site.

Explosives, agent breakdown products, and metals were detected in shallow soil samples collected during Phase I activities. Extensive rodent droppings are present in the cave. A concern over hanta virus in the environmental samples has delayed analysis. In addition, a low level detection of mustard was identified during the Phase II RFI investigation.

CLEANUP STRATEGY

The opening of the cave will be gated or closed in other ways (planned for Sept 2005). Finalize the RFI (final approval Feb 2007).

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Hanta Virus,
Explosives, ABPs, Metals, Mustard

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199307	199308
CS.....	199307	199610
RFI/CMS.....	199610	200610
LTM.....	200610	203609

RC expected: 200610

DPG-204

LEWISITE AREA, SIMPSON BUTTES

SITE DESCRIPTION

DPG-204 lewisite demolition area is located on the southwest corner of Simpson Buttes. DPG-204 was a demilitarization area for 105 mm, 155 mm and 4.2 inch mortar chemical rounds. The area (0.2 acres) was reportedly active in the late 1940s. The demilitarized rounds were all reported to have contained lewisite (L). A pile of rusted chlorinated lime bleach cans is located at this site.

IRAs consisted of the overpacking and removal of 16 suspect L liquid-filled dud rounds in 1994 with fencing and warning signs placed in 1996. The rounds were transported to Igloo G in Carr for storage. HD and ABPs were detected in the soil.

Soil samples taken in 1994 showed the presence of chemical agent.

MEC and debris is present at the site.

CLEANUP STRATEGY

Additional field work (Oct 2005) and debris removal will be needed before the RFI can be completed. Finalize the RFI and CMS. Grading, surface water reroute, additional debris removal and soil cover may be expected.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Chemical Agent (Lewisite, HD)

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199511	.....199701
CS.....	199704	.....199709
RFI/CMS.....	199701	.....200705
IRA.....	199609	.....199610
DES.....	200705	.....200801
CMI.....	200802	.....200811
LTM.....	200905	.....203905
RC expected: 200811		

DPG-205

GRASSY PLOTS GRID, EAST OF BAKER

SITE DESCRIPTION

DPG-205, Grassy Plots Grid, is located approximately 0.6 miles northeast of Burns Road and approximately three miles east of the Baker Facility. The area is a surface disposal site for leftover test material (2 acres); part of the Grassy Plots Test Grid was used during the 1960s. Debris at the site consists of a drum overpack, two steel 55-gallon drums, one steel 35-gallon drum, a pile of scrap wood, two 1-gallon glass jugs, and a stack of partially burned bags of fertilizer. All surface material has been removed and properly disposed.

Stained soil and debris was removed in FY03.
Additional soil was removed in April 2005.

CLEANUP STRATEGY

Finalize the RFI recommending NFA (expect final approve Aug 2005). The permit will be modified.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:
Corrective Action

CONTAMINANTS:
Manganese

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200509

RC expected: 200509

SURFACE DISPOSAL AREA NW OF MICHAEL AAF

SITE DESCRIPTION

DPG-206 is a surface disposal site located off a dirt road approximately 0.7 miles southwest of Michael Army Airfield. The site consists of a low relief bermed area of debris, scattered surface debris and 18 double stacked M468 bomb shipping dispensers. The bermed area dimensions are approximately 1,000 ft². Within this area is a debris pile consisting of 20-gallon drums, rubber hoses, a glass jug, springs, ash residues, rusting zippers, D-rings, small arm blank ammunitions, scattered wood and glass debris. The site was used during the 1960s.

The debris was removed in 2003.

CLEANUP STRATEGY

Finalize NFA RFI (expect final approval in May 2006).
The permit will be modified in Sept 2006.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Arsenic, Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200609

RC expected: 200609

DPG-207

DISPOSAL TRENCHES AND MOUNDS, CARR

SITE DESCRIPTION

DPG-207 is a site containing numerous burial trenches and mounds of suspected MEC and possible chemical agents (P999/F999 waste). Location is between Carr Facility (Bldg. 3445) and the evaporation pond (DPG-058). The site covers approximately 1 to 2-acres and is covered with surface debris consisting of scrap metal, ordnance fragments, half buried ordnance, glass and wood. The dates of disposal at this site are unknown; however, ground scarring can be observed on aerial photographs dating back as early as 1950.

TCE and carbon tetrachloride have been detected in the groundwater. There are eight trenches of uncharacterized waste. Additional delineation was completed in FY03.

CLEANUP STRATEGY

Finalize the RFI (final approval expected in June 2005).

This site is expected to be included in the FY05 PBC award.

CMI may include soil cover, debris removal and SVE/air sparging.

Groundwater will be addressed under the Carr GMA (funded under DPG-061).

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

MEC, VOCs, ABPs

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200509
DES.....	200510	200609
CMI.....	200610	200709
LTM.....	200710	203709
RC expected: 200709		

DPG-208

DRUM BURIAL SITES SE OF CARR

SITE DESCRIPTION

DPG-208 is a 2-acre chemical disposal site, used in the 1940s, located approximately 2.5 miles from the Carr Facility along the old Lincoln Highway, at the eastern end of Test Area 19. Four drums are visible in a wash. PINS analysis determined one of the drums is empty and three contain liquid. The wash was surveyed for buried ferrous metal using a metal detector. Magnetic anomalies were identified along the drainage for a distance of about 500 ft. The history of the site is uncertain. However, information from a former DPG employee suggests that this site is similar to the location of where 15 drums of mustard agent/lime mixtures were buried in the late 1940s.

A Phase II RFI is underway.

CLEANUP STRATEGY

A plan is being developed for TEU to sample the drums for CWA and RCRA characterization in advance of removal. The RFI (field work planned for Oct 2005) and request for NFA report will be completed.

STATUS

RRSE RATING: High

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Chemical Agent (Mustard)

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199611	.....199701
CS.....	199701	.....199704
RFI/CMS.....	199701	.....200609

RC expected: 200609

DPG-209

BIOLOGICAL TEST PLOTS, BAKER

SITE DESCRIPTION

DPG-209, the Biological Test Plots are located ~200 ft west of the Baker area, north of Burns Road approximately 1.1 miles off of Romeo Road. The site is believed to have been active from 1952 to the 1960s, although the types of materials used at the site are unknown. The ~10 acre site is relatively flat with sagebrush and sand dunes to the north. There is an area of disturbed soil.

No samples have been taken.

CLEANUP STRATEGY

RFI field work is planned for Sept 2005. The RFI and request for NFA report will be completed (final approval expected Jan 2007. The permit will be modified in Sept 2007.

STATUS

RRSE RATING: NE

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Possible Biological Warfare Agent

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200709

RC expected: 200709

DPG-210

GLASS DISPOSAL SITE, SO OF BAKER

SITE DESCRIPTION

DPG-210, a surface disposal area with broken glass scattered throughout the site and is located along a dirt road approximately one mile south of the Baker Facility. The area was used for disposal in the 1950s and 1960s. The site terrain is flat with low sand dunes scattered throughout the area. Broken and melted glassware is partially buried in a bermed area approximately 23 x 35 ft. Much of the glassware in the bermed area consists of cylindrical tubes that taper at both ends. The tubes appear to be some type of sampler, and it is not known if these were used at the Baker lab or in field tests. Northeast of the bermed area is a smaller surface pile of broken and melted glass, glass tubing, wire, and rusted nails.

No samples have been taken.

CLEANUP STRATEGY

RFI field work and limited soil removal is planned for Sept 2005. The RFI and request for NFA report will be completed (final approval expected Jan 2007. The permit will be modified in Sept 2007.

STATUS

RRSE RATING: NE

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS:

Possible Biological Warfare Agent

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200709

RC expected: 200709

DPG-211 CORAL PIT WASTE PILE, N OF CAMELS BACK RIDGE

SITE DESCRIPTION

DPG-211, Coral Pit Waste Pile, is located on the north side of Camels Back Ridge. The site was originally used as a gravel/borrow pit. Three surface disposal piles are located near the center of the pit area. Debris in these piles consists of smoke and incendiary rounds, scrap metal, barbed wire, range clean-up debris, test tube holders, incendiary devices, magnesium debris, miscellaneous metal scrap, rubber tubing, and critical orifices used for samplers at Tower Grid. The three combined debris piles encompass an area of approximately 4,500 ft². The 1-acre site was used for disposal in the 1960s.

Debris removal was completed in summer 2003.

CLEANUP STRATEGY

The RFI and request for NFA report will be completed (expect final approval in March 2006). The permit will be modified in Sept 2006.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Arsenic, Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200609

RC expected: 200609

DPG-212

M61 ROCKET TEST SITE SO TOWER GRID

SITE DESCRIPTION

DPG-212, the M61 Rocket Test Site, is located 0.85 miles from the junction of MacIntyre Road, southeast on a gravel road near Tower Grid. The explosive ordnance disposal site (used in the 1960s) is located adjacent to the gravel road and is approximately 0.7-acres in size. The site consists of a semi-circular mound that is vegetated. Some debris consisting of M61 rocket (simulant-filled) parts are visible on the ground surface. Splintered wood is partially buried in the mound area. Reportedly, this site was active in the mid-1960s, and consisted of an earthen covered bunker filled with M61 rockets. The rockets were detonated to determine sympathetic detonations. Detonation remnants are reportedly buried in the mound area.

An IRA to install site control measures (i.e., fence and warning signs) was completed at DPG-212 in 1999. No significant soil contamination has been detected. The RFI report was approved in Oct 2003. The CMS was approved in Nov 2003.

CLEANUP STRATEGY

This site is expected to be included in the FY05 PBC award.

The surface and subsurface debris is expected to be removed.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200312
IRA.....	199809	199809
DES.....	200510	200601
CMI.....	200601	200609
RC expected: 200609		

DPG-213

BURIAL TRENCH, TARGET S

SITE DESCRIPTION

DPG-213 is a burial trench approximately 0.2 miles northeast of November Road, west of Target S. The site consists of a low relief mound approximately 200 x 40 ft, and was used from the 1950s to the 1970s. Scattered metal debris, including M55 and Hedgehog rocket parts, are visible on the ground surface near the south end of the mounded area. The middle one-third of the mound has subsided.

There is uncharacterized waste in the trench that has not been sampled. No significant contamination has yet been detected in soil or groundwater. The final RFI was approved in Sept 2004.

CLEANUP STRATEGY

Finalize CMS (draft final submitted).

This site is expected to be included in the FY05 PBC award.

Debris removal and soil cover may be needed.

The groundwater will be addressed as part of the Downrange GMA (funded under DPG-197).

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200510
DES.....	200510	200609
CMI.....	200610	200709
LTM.....	200710	203709
RC expected: 200709		

DPG-214

DECONTAMINATION PAD, TARGET S

SITE DESCRIPTION

DPG-214 is a decontamination pad wash rack located on an unnamed gravel road approximately 0.9 miles southwest of Stark Road on the east side of Target S. The unmarked road is between November and Lima Roads. The site consists of a raised gravel layer 75 x 50 ft wide and sloped at both ends. The decontamination site was used during the 1950s for activities at Old Target S. Vehicles that were used to pick up samplers on the grid site were brought back to this pad and the undercarriages were decontaminated. Personnel wearing protective clothing were also decontaminated at this site.

A Phase II RFI is underway. In order to sample the site, the matting was removed (and recycled) in summer 2003.

CLEANUP STRATEGY

The RFI and request for NFA report will be completed (expected final approval in Sept 2005). The permit will be modified in Sept 2005.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Arsenic, Metals

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	199611	.....199701
CS.....	199704	.....199709
RFI/CMS.....	199701	.....200509

RC: 200509

PIGEON LOFT TRENCHES, DOWNWIND GRID

SITE DESCRIPTION

DPG-215 is a site (used in the 1960s) that consists of two possible separate backfilled trenches, and is located on Pigeon Loft Road by the remnants of the former pigeon loft. The pigeon loft was a metal building on a concrete foundation that housed pigeons used in test operations. An area of disturbed ground with no vegetation, approximately 150 x 40 ft, lies perpendicular to the foundation. A second trench is located approximately 275 ft north of the concrete slab, on the north side of the road. Two metal drum stands and a metal table are located at the surface at this site. Partially buried material such as metal piping and scrap metal are also visible at the surface. Numerous magnetic anomalies were detected using a metal detector.

Low levels of explosives have been detected in groundwater. The waste has not been sampled. The final RFI was approved in Sept 2004.

CLEANUP STRATEGY

Finalize CMS (draft final submitted).

This site is expected to be included in the FY05 PBC award.

Debris removal and soil cover may be needed.

The groundwater will be addressed as part of the Downrange GMA (funded under DPG-197).

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Explosives

MEDIA OF CONCERN:

Groundwater

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200509
DES.....	200510	200609
CMI.....	200610	200709
LTM.....	200710	203709

RC expected: 200709

DPG-216

TRASH PIT, GRANITE MTN

SITE DESCRIPTION

DPG-216, a trash pit, is located northwest of Granite Peak, north of Goodyear Road, and west of DPG-002. The site (used in the 1960s) consists of an oval pit that is approximately 33 x 24 ft. The pit contains a table, chair, tub/container, broken glass and metal debris. None of the debris appeared to contain hazardous constituents.

A Phase II RFI is underway. Debris was removal in summer 2003.

CLEANUP STRATEGY

The RFI and request for NFA report will be completed (expected final approval in Sept 2005). The permit will be modified in Sept 2005.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:
Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199611	199701
CS.....	199704	199709
RFI/CMS.....	199701	200509

RC: 200509

PBC AT DUGWAY

SITE DESCRIPTION

This site was set up to fund the PBC at Dugway.

STATUS

RRSE RATING: Low

CONTAMINANTS: Metals

MEDIA OF CONCERN:
Groundwater

PHASES	Start	End
RFA.....	200001	.....200009
CMI.....	200505	.....200709

RC expected: 200709

DUGWAY PROVING GROUND

IRP

RESPONSE COMPLETE SITE
DESCRIPTIONS

DECOM PAD, SOUTH OF DITTO TECH CENTER

SITE DESCRIPTION

DPG-038 is contaminated soil associated with a decon pad located on the southwestern perimeter of the Ditto Technical Center, operational since 1986. The pad (~5 acres) was used for decontamination of agent-simulant-contaminated vehicles, and cleaning of drums used for hazardous waste disposal. Spent decontamination solutions used at the site were taken by tank truck to DPG-07, the Brine Vats at Granite Mountain, for evaporation.

Warning signs were placed at the site in 1988. The decontamination unit consists of an elevated concrete pad with a control house, an aboveground storage tank, and a pump house. The concrete decontamination pad is approximately 8 ft above grade and is accessed by dirt ramps on the west and east sides. The pad and support facilities are active and will be retained for future use.

High levels of chlorinated solvents were detected. Quarterly groundwater monitoring using the existing wells was performed in 2000. Semiannual groundwater monitoring was performed in 2001. In addition, cone penetrometer and hydropunch sampling was performed in FY01 to verify the groundwater contamination plume boundary. Soil sampling to identify source areas was completed in FY02. Low levels of VOCs were detected in soil. The solvent in the upper aquifer is confined laterally. The final closure report was approved in Sept 2004.

The groundwater will be monitored under DPG-097.

STATUS

RRSE RATING: High

LEGAL DRIVERS: Consent Order

CONTAMINANTS: PCE

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	198905	199609
RFI/CMS.....	199609	200208
IRA.....	198802	198802
DES.....	200304	200310
CMI.....	200310	200410
CMI(O)	200310	200410
LTM.....	200410	200409

RC: 200410

DPG-042 CONTRACTOR LANDFILL NEAR ENGLISH VILLAGE

SITE DESCRIPTION

DPG-042 is an inactive, 6.4 acre landfill (used from 1964 to the 1980s) located south of English Village that operated from the mid-1960s until the early 1980s. This site is located over a productive high quality groundwater source. The unit currently includes several soil and debris piles. The largest pile, at the south end of the unit, measures approximately 350 x 500 ft. Prior to its use as a landfill, the site was an oxidation pond for sewage and stormwater runoff from English Village from 1951 until 1964. The oxidation pond received treated wastewater from the English Village Sewage Treatment Plant. Upon ceasing operations, the sludge that remained in the lagoon and part of the berm were moved to allow better access to the landfill.

STATUS

RRSE RATING: High

CONTAMINANTS:

PCBs, Organics, Metals

MEDIA OF CONCERN:

Soil, Groundwater

PHASES	Start	End
RFA.....	198601	198802
CS.....	198905	199609
RFI/CMS.....	199609	200303
IRA.....	199205	199205
DES.....	200302	200308
CMI.....	200308	200501

RC: 200501

Warning signs were placed at the site in 1992. Groundwater monitoring has been conducted at DPG-042 since 1996. No significant contamination has been detected. Trenching activities were conducted in 2000 to better determine the contents and extent of the landfill. Trenching concluded that the landfill cell is located under the asphalt rubble, south of the suspected location. A soil gas investigation was then performed in 2001 to augment the trenching activities, verify the adequacy of the groundwater monitoring network, and better assess remedial options. The debris removal (~80,000 cy) was completed in early 2004. Approximately 40,000cy was used as sub-grade material at DPG-043.

The final closure report was approved Jan 2005.

This site was included in the ITR program. The ITR recommended using only wells screened at comparable elevations to prepare potentiometric maps. Dugway took this concern and performed an in depth review of monitoring well bore logs for the site. This review revealed that while 042-MW01 is adequate as a background well, 042-MW03 may not be adequate as a downgradient well. Dugway is taking a closer look at the downgradient monitoring network at the site. The ITR also recommended that risk-based closure principles be applied to close the site in-place. Dugway did not occur with this recommendation. The Dugway position is based on both Utah Administrative Code R315-101 and Appendix C of the ITR report. According to these references, DPG-042 would not be eligible for risk-based closure unless all hazardous waste is removed.

DPG-113

LANDFILL POLE LINE ROAD

SITE DESCRIPTION

This is a 1.1-acre landfill area located in the Carr facility, active during the 1950s. The site of two former waste piles that had reportedly received wastes from the Ecology and Epidemiology Lab (i.e., GPI-1 Complex) that included: rusted 55-gallon drums, wood cages, amber jugs, garbage cans, broken glass vials, spent mortars, smoke canisters, and metal scrap. Approximately 4.5-tons of the debris were removed under base contract in 1993 and disposed of in the DPG landfill. However, recent site inspections have revealed small fragments of debris remain at the site.

The Phase I investigation did not address a geophysical anomaly that was detected near the northwest perimeter of the site. The final RFI report supporting NFA was approved Sept 2004.

STATUS

RRSE RATING: Low

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMS.....	199809	200410
IRA.....	199301	199310

RC: 200409

DPG-116

LANDFILL NYE ROAD

SITE DESCRIPTION

This is a 4.1-acre site of a landfill located in the Ditto area, active prior to 1987. The disposal area consists of several mounds, burn areas, various debris piles, a partially backfilled trench, and a building foundation. Fragments of wood, metal, glass, and plastic are scattered intermittently throughout the site. Also present at the site are auto parts, batteries, wire, and charcoal. The site was reportedly used for disposal of wastes generated at the former maintenance shop, including possible F999 wastes. Three separate areas were noted as being impacted by site activities.

A removal of contaminated soil and debris was completed in FY03. The NFA RFI was approved and the permit was modified in Sept 2004.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS:

Corrective Action

CONTAMINANTS: Metals, TPH

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199107	199111
CS.....	199210	199610
RFI/CMI.....	199610	200409

RC: 200409

DPG-169

BAKER VEHICLE WASH RACK

SITE DESCRIPTION

Located in the Baker area (Bldg 2006), DPG-169 was used approximately once each year in the 1960s to clean and maintain vehicles. Interviews with DPG employees indicate that vehicles brought to DPG-169 may have been used in agent tests or other field tests. Vehicles were likely decontaminated at DPG-013 prior to being brought to DPG-169. The site consists of two concrete pads, a concrete trough, and an unlined evaporation pond (~3 acres).

Warning signs were placed in 1992. Sampling locations to complete the characterization have been agreed upon with UDEQ. Additional samples were taken in 2002. Structure decontamination may also be required to attain risk-based closure. No major contamination has been detected at this site.

Risk-based industrial closure was approved in Sept 2004.

STATUS

RRSE RATING: Medium

LEGAL DRIVERS: Consent Order

CONTAMINANTS:

VOCs, ABPs, Metals

MEDIA OF CONCERN: Soil

PHASES	Start	End
RFA.....	199001	199009
CS.....	199111	199609
RFI/CMS.....	199609	199901
IRA.....	199205	199205
DES.....	200101	200304
CMI.....	200304	200410

RC expected: 200410

RESPONSE COMPLETE AEDB-R SITES

AEDB-R #	SWMU#	AEDB-R Title	RC Date
DPG-001		SCRAP CONSTRUCTION MAT FILL FROM V-GRID	2001
DPG-005		CONTAMINATED MAT BURIAL SITE (V-GRID)	2000
DPG-007		BRINE VATS, WEST OF GRANITE PEAK	2003
DPG-010		LOW LEVEL RAD LANDFILL, WEST OF GRANITE	2004
DPG-012		LOW LEVEL RAD LANDFILL, SE GRANITE PEAK	1999
DPG-013		DECON PAD, JCT DOWNWIND W & LIMA ROADS	2001
DPG-020		LANDFILL NORTH OF CAMELBACK RIDGE	1998
DPG-022		IGLOO SITE (SW TOWER GRID)	1999
DPG-027		PCB/POL STORAGE SITE (BLDGS 9450/9452)	1994
DPG-028		SURFACE WASTE DISPOSAL SITE (H GRID)	1999
DPG-029		SURFACE WASTE SITE BTWN S WIG MTN & HGRD	1998
DPG-030		FUEL TANK SITE @ WIG MOUNTAIN	1995
DPG-033		OLD SEWER LAGOON, NORTH OF BAKER LAB	2002
DPG-034		BOILER BLOWDOWN POND BAKER AREA	2002
DPG-038		DECOM PAD, SOUTH OF DITTO TECH CENTER	2004
DPG-040		FENCED STORAGE AREA @ AVERY FACILITY	2003
DPG-042		CONTRACTOR LANDFILL NEAR ENGLISH VILLAGE	2005
DPG-045		SUMP @ FAC ENGR AREA @ ENGLISH VILLAGE	1997
DPG-046		SHOP SUMP MAINT AREA @ ENGLISH VILLAGE	2004
DPG-047		SEWAGE LAGOON, SOUTH OF FRIES PARK	2003
DRP-048		3X STORAGE AREA @ FRIES PARK	2004
DPG-049		PCB STORAGE HUT (FRIES PARK)	1994
DPG-050		DISPOSAL AREA, NE CAMELBACK RIDGE	1998
DPG-053		WASTE BURIAL SITES DURRAND ROAD	1998
DPG-059		PAD & 3X STORAGE AREA @ CARR FAC	2003
DPG-062		AMMO IGLOOS @ CARR FACILITY	1998
DPG-063		SEPTIC TANK/DRAINFIELD @ CARR FACILITY	2002
DPG-064		WASTE BURIAL SITE (SE TOWER GRID)	1999
DPG-065		LANDFILL (WHITE SAGE FLATS)	2004
DPG-066		DISPOSAL AREA NEAR HILL 5700	1999
DPG-067		LANDFILL (NORTH CEDAR MOUNTAIN)	1991
DPG-069		POL AST AREA @ ENGLISH VILLAGE	1991
DPG-070		DISTURBED AREA (ANIMAL WASTE DUMP)(EV)	2001
DPG-071		SKEET RANGE (EPIC-2A)	1991
DPG-072		SAND/GRAVEL PITS (EPIC-2C)	1991
DPG-073		HORSE STABLE AREA (EPIC-3A)	1991
DPG-074		TRENCH, CONTENTS UNK (EPIC-3B)	1991
DPG-076		STAINED/DISTURBED GROUND (EPIC-3F)	1991
DPG-078		GROUND SCARS (EPIC-4C)	1993
DPG-081		FORMER MUNITIONS STORAGE IGLOO (1942-80)	1999
DPG-082		WASTE PILE (E OF MICHAEL AAF) (EPIC-7A)	1998
DPG-083		GROUND STAINS (EPIC-8A)	1991
DPG-084		FILL MATERIAL TRENCHES (EPIC-8B)	1991
DPG-085		DUNE FIELD BORROW AREA (EPIC-8C)	1991
DPG-086		FORMER COAL PILES @ DITTO FAC (EPIC-9A)	1991

RESPONSE COMPLETE AEDB-R SITES

AEDB-R #	SWMU#	AEDB-R Title	RC Date
DPG-088		BORROW PIT LOCATIONS (EPIC-9C)	1993
DPG-091		ASPHALT PILE SO OF BAKER	2000
DPG-092		LANDFILL (NO EAST OF BAKER)	2001
DPG-093		EXCAVATION/TRENCHES (EPIC-12A)	2001
DPG-094		BORROW PIT SOUTH OF BAKER (EPIC-12B)	1991
DPG-095		BORROW PIT SE OF GRANITE PEAK (EPIC-13 B)	1991
DPG-096		CONCRETE DEBRIS, S OF MICHAEL AAF	2001
DPG-099		3X DISPOSAL AREA VIC E CAMELBACK MT	2004
DPG-100		DITTO AREA WATER AQUIFIERS	1991
DPG-101		WASTE DISPOSAL SITE (EAST OF WIG GRID)	1999
DPG-102		NEW SANITARY LANDFILL, WEST OF FRIES PARK	1991
DPG-103		DECON PAD @ BLDG 9411, WEST GRANITE MTN	1999
DPG-104		DECON PAD, JCT TANGO/BURNS/VICTORY	1999
DPG-107		DECONTAMINATION PAD (TOWER GRID)	1999
DPG-108		BE & C14 WASTE DISPOSAL AREA (EPIC 3-2)	1998
DPG-109		BE & C14 WASTE DISPOSAL AREA (EPIC 3-2)	1998
DPG-110		BE & C14 WASTE DISPOSAL AREA (EPIC 3-2)	1999
DPG-111		BE & C14 WASTE DISPOSAL AREA (EPIC 3-2)	1999
DPG-113		LANDFILL POLE LINE ROAD	2004
DPG-116		LANDFILL NYE ROAD	2004
DPG-117		WASTE DISPOSAL PIT (FALCONER ROAD)	2001
DPG-119		OB/OD PAN, 4MI EAST OF CARR FACILITY	1993
DPG-120		BURN FACILITY IN BUILDING 5710	1992
DPG-121		INCINERATOR, BAKER LAB BASEMENT	1992
DPG-122		INCINERATOR, BAKER LAB BASEMENT	1999
DPG-123		INCINERATOR (BAKER) BLDG 2028)	1998
DPG-124		3X/5X CARR FACILITY INCINERATOR	2004
DPG-125		AVERY BOILER BLOWDOWN SUMP (DITCH)	1992
DPG-126		YELLOW JACKET AREA	1991
DPG-127		SOUTHERN TRIANGLE AREA (INCL RISING SUN)	1991
DPG-128		PESTICIDE STORAGE BLDG ENGLISH VILLAGE	2004
DPG-130		SUMP, AAFES GAS STATION, ENGLISH VILLAGE	2004
DPG-131		HWA-1 (PAINT SHOP WASTES)	1997
DPG-132		HWA-2 (MOTOR VEHICLE SHOP WASTES)	1997
DPG-134		HWA-4 (CHEM LAB 3X WASTES)	1997
DPG-135		HWA-5 (PHOTO WASTES)	1997
DPG-136		HWA-6 (TEST GENERATED WASTES)	1997
DPG-137		HWA-7 (GRID OPS BRANCH WASTE)	1997
DPG-138		HWA-8 (LUB OIL-ANTIFREEZE)	1997
DPG-139		HWA-9 (MOTOR OIL-ANTIFREEZE)	1997
DPG-140		HWA-10 (BATTERIES & KOH SOL)	1997
DPG-141		HWA-11 (MOTOR VEHICLE SHOP WASTES)	1997
DPG-142		HWA-12 (3X WASTE FOR INCINERATORS)	1997
DPG-143		HWA-13 (3X MATERIAL)	1997
DPG-144		HWA-14 (BLEACH, LAB, SLNS)	1997

RESPONSE COMPLETE AEDB-R SITES

AEDB-R #	SWMU#	AEDB-R Title	RC Date
DPG-145	HWHA-15 (ENGLISH VILLAGE AUTOSHOP)		1997
DPG-146	TANK TRUCK H2 SO4		1997
DPG-147	AST DECON PAD C-8 EMULSION		1993
DPG-148	HEALTH CLINIC TANK #1		1993
DPG-149	HEALTH CLINIC TANK #2		1993
DPG-151	STAINLESS STEEL SUMP CARR (3X)		1997
DPG-152	STAINLESS STEEL HOLDING TANK, CARR (3X)		1997
DPG-153	STAINLESS STEEL SUMP, CARR (3X)		1997
DPG-155	WASTE TANK, DTC, CARR (3X)		1996
DPG-156	AST, DTC, CARR (3X)		1996
DPG-157	SUMP, DTC, CARR (3X)		1996
DPG-158	EVAP POND NO OF MICHAEL AAF		2004
DPG-159	INCINERATOR, ENGLISH VILLAGE		1999
DPG-160	AIR FORCE PAD 777 LF #1		1995
DPG-161	AIR FORCE PAD 777 LF #2		1995
DPG-162	DECON PAD NO OF AVERY		2003
DPG-164	AVERY WASH RACK #1		1996
DPG-165	AVERY WASH RACH #2		2003
DPG-166	AVERY WASH RACK #3		1996
DPG-167	CONT SOIL @ DITTO BLDG 4358		2003
DPG-169	BAKER VEHICLE WASH RACK		2004
DPG-170	STEAM CLEANING ENGLISH VILLAGE/STARK RD		1996
DPG-172	OLD BATTERY SHOP AVERY AREA (BLDG 1006)		2004
DPG-174	STORAGE SHEDS AT BAKER		1998
DPG-175	ACID NEUTRALIZATION TANK - AVERY AREA		2004
DPG-176	ACID DILUTION BOX - 4026 DITTO		1999
DPG-178	PHOTO PROCESSING BUILD - DITTO (4258)		2001
DPG-179	BLDG 3342, 3048 SUMPS		2004
DPG-181	X-RAY LAB, CARR FACILITY (BLDG 3131)		2001
DPG-182	OPEN DET UNIT/SUPPRESSIVE TEST SHIELD		2001
DPG-184	AIR FILTER SYSTEM, BLDG 1004		2001
DPG-186	NEW CHEMICAL LABORATORY - DITTO AREA		1996
DPG-187	PRINT SHOP - ENGLISH VILLAGE (5466)		2001
DPG-190	RANGER LANDFILL AT PRIME ROAD GRAVEL PIT		2003
DPG-191	LANDFILL - WEST OF EXISTING LANDFILL		2001
DPG-195	INCINERATOR EAST OF CARR		2001
DPG-196	INCINERATOR EAST OF CARR		1999
DPG-198	X-RAY PROCESSOR - HEALTH CLINIC		1997
DPG-202	WASTE PILE AT CPI 3 (NOW DPG-114)		1998
DPG-203	LANDFILL NORTH OF APG		1999

PAST MILESTONES

Start Date of IRP at Installation: 1979

Past Phase Completion Milestones:

<u>IRP Phase</u>	<u>Completion Date</u>
Initial Installation Assessment (IA)	Apr 79
Update of Initial IA	Jul 88
IR Program Plan	Nov 88
RCRA Facility Assessment	Mar 92
Nature & Extent Inv (Consent Order SWMUs)	May 95
Interim Removal Actions	Dec 98
Closure Plans (Consent Order SWMUs)	Sep 96
RFI (Corrective Action SWMUs) (Phase I)	Oct 96

IAG/FFA Driven Milestones: N/A

PROJECTED MILESTONES

Projected ROD/DD Approval Date: DD completed onsite-specific basis as needed

Projected Phase Completion Milestones: See site descriptions

Projected construction complete and NPL Deletion Date: 2015+

Estimated Completion Date of All RA(C) Activities: 2015+

Estimated Completion Date of IRP at Installation (include LTM phase): 2036+

Dugway Proving Ground IRP Schedule

(Based on current funding constraints)

Current Phase

Future Phase

AEDB-R #	PHASE	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	FY14	FY15+
DPG-002 H	LTM										203307
DPG-008 H	RFI										
DPG-035 H	RFI										
DPG-037 H	CMI										
	LTM										203606
DPG-039 H	CMI										
	LTM										203509
DPG-043 H	LTM										203410
DPG-044 H	LTM										203509
DPG-051 M	DES										
	CMI										
DPG-090 H	CMI										
	LTM										203509
DPG-098 H	RFI										
DPG-133 H	RFI										
DPG-154 L	RFI										
DPG-168 H	CMI										
DPG-173 H	RFI										
DPG-183 L	RFI										
DPG-189 M	RFI										
	DES										
	CMI										
DPG-193 L	RFI										
DPG-201 M	RFI										
	LTM										203609
DPG-204 H	RFI										
	DES										
	CMI										
	LTM										203905
DPG-206 M	RFI										
DPG-208 H	RFI										
DPG-209 NE	RFI										
DPG-210 NE	RFI										
DPG-211 L	RFI										
DPG-003 H	DES										
	CMI										
	LTM										203707
DPG-009 H	RFI										
	IRA										
	DES										

Dugway Proving Ground IRP Schedule

(Based on current funding constraints)

Current Phase

Future Phase

AEDB-R #	PHASE	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	FY14	FY15+
	CMI										
	LTM										203909
DPG-014 H	RFI										
	DES										
	CMI										
	LTM										203804
DPG-017 H	RFI										
	DES										
	CMI										
	LTM										203701
DPG-018 M	DES										
	CMI										
DPG-019 L	RFI										
	DES										
	CMI										
	LTM										203805
DPG-021 H	RFI										
	DES										
	CMI										
	LTM										203706
DPG-023 L	RFI										
	DES										
	CMI										
	LTM										203803
DPG-025 L	RFI										
	DES										
	CMI										
	LTM										203809
DPG-052 H	RFI										
	DES										
	CMI										
	LTM										203711
DPG-054 H	DES										
	CMI										
	LTM										203709
DPG-056 M	RFI										
	DES										
	CMI										
	LTM										203709
DPG-061 M	RFI										

Dugway Proving Ground IRP Schedule

(Based on current funding constraints)

Current Phase

Future Phase

AEDB-R #	PHASE	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	FY14	FY15+
	DES										
	CMI										
	CMI(O)										
	LTM										203909
DPG-079 H	RFI										
	DES										
	CMI										
	LTM										203609
DPG-115 L	RFI										
	DES										
	CMI										
	LTM										203609
DPG-118 M	DES										
	CMI										
DPG-188 M	DES										
	CMI										
	LTM										203709
DPG-194 H	RFI										
	DES										
	CMI										
	LTM										203709
DPG-200 H	DES										
	CMI										
	LTM										203709
DPG-207 H	DES										
	CMI										
	LTM										203709
DPG-212 M	DES										
	CMI										
DPG-213 M	RFI										
	DES										
	CMI										
	LTM										203709
DPG-215 M	DES										
	CMI										
	LTM										203709
DPG-006 M	LTM										204711
DPG-055 H	DES										
	CMI										
	LTM										203709

Dugway Proving Ground IRP Schedule

(Based on current funding constraints)

Current Phase

Future Phase

AEDB-R #	PHASE	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	FY14	FY15+
DPG-058 H	DES										
	CMI										
	LTM										203601
DPG-060 H	RFI										
	DES										
	CMI										
DPG-177 H	RFI										
	DES										
	CMI										
	CMI(O)										
DPG-197 M	RFI										
	DES										
	CMI										
	CMI										
	LTM										203709
DPG-199 H	RFI										
	DES										
	CMI										
	LTM										203809
DPG-004 H	RFI										
	DES										
	CMI										
DPG-011 L	RFI										
	DES										
	CMI										
DPG-015 NE	RFI										
	DES										
	CMI										
DPG-031 L	RFI										
	DES										
	CMI										
DPG-032 H	RFI										
	DES										
	CMI										
	LTM										203909
DPG-041 H	RFI										
	DES										
	CMI										
DPG-097 H	RFI										
	IRA										

Dugway Proving Ground IRP Schedule

(Based on current funding constraints)

Current Phase

Future Phase

AEDB-R #	PHASE	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	FY14	FY15+
	DES										
	CMI										
	LTM										20371
DPG-114 L	RFI										
	DES										
	CMI										
DPG-150 M	RFI										
	DES										
	CMI										
DPG-180 H	RFI										
	DES										
	CMI										
	LTM										203809
DPG-192 H	RFI										
	DES										
	CMI										
	LTM										203809

PRIOR YEAR FUNDING

FY78/85	Preliminary Assessment	\$64K	\$64K
FY89	Site Inspection	\$2,249K	
	Installation Support	80K	\$2,329K
FY90	Installation Support	\$197K	\$197K
FY91	Nature & Extent Investigation	\$5,203K	
	Corrective Action Support	100K	
	Installation Support	237K	\$5,540K
FY92	Nature & Extent Investigation	\$1,758.8K	
	RCRA Facility Investigation	4,668K	
	Removal Actions	2,452.9K	
	Installation Support	455.9K	\$9,335.6K
FY93	Nature & Extent Investigation	\$4,930.5K	
	Removal Actions	193K	
	Installation Support	552K	\$5,675.5K
FY94	RCRA Facility Investigation	\$2,469.5K	
	Nature & Extent Investigation	4,933.6K	
	Removal Actions	1,534K	
	Installation Support	1,062K	
	Monitoring Support	201.5K	\$10,200.6K
FY95	Closure Plans Investigation	\$161.6K	
	REM	388.5K	
	Installation Support	1,034.6K	
	LTM	977.1K	\$2,561.8K
FY96	Closure Plans Investigation	\$631K	
	RFI	1,010K	
	REM	1,017K	
	Installation Support	200K	
	LTM	500K	\$3,358K
FY97	Closure Plans Investigation	504K	
	RFI	1,119K	
	Installation Support	700K	
	LTM	600K	
	RD/RA	4,047K	
	RAB/TRC Support	50K	
	COE S&A	50K	\$7,070K

FY98	RFI	\$3,890.5K	
	LTM	1,000K	
	RD	5,770.5K	
	RA	1,579K	
	RAB/TRC Support	5K	
	IRA	325K	\$12,570K
FY99	LTM	\$1,044.4K	
	RFI	8,795.2K	
	RA	1,489.8K	
	RD	795K	
	IRA	345K	
	RAB/TRC Support	35K	
	Program Management	78K	\$12,582.4K
FY00	LTM	\$1,190.5K	
	RFI	1,660K	
	RA	8,267.5K	
	RD	2,012K	
	IRA	120K	
	RAB/TRC Support	35K	
	Program Management	82K	\$13,367K
FY01	RFI	\$3,877K	
	RD	3,214K	
	RA	4,609K	
	IRA	537K	
	RAB/TRC Support	6K	
	Program Management	120K	\$12,363K
FY02	RFI	\$1,125K	
	RD	3,192K	
	RA	4,272K	
	LTM	11K	
	RAB/TRC Support	38K	
	Program Management	135K	\$8,773K
FY03			\$10,000K
FY04			\$8,000K
Total Prior Year IRP Funds:		\$123,986,900	

CURRENT YEAR FUNDING

FY05

expected

\$8,000K

FUTURE YEAR FUNDING***TOTAL FUTURE REQUIREMENTS:*** \$122,942,000***TOTAL IRP PROGRAM COSTS:*** \$246,936,900

Community Involvement

Dugway established a Restoration Advisory Board (RAB) in FY00. RAB members are from the following communities: English Village (DPG), Skull Valley, Grantsville, Rush Valley, Stansbury, Tooele, and Vernon. In addition, representatives from local government, U.S. Environmental Protection Agency, DSHW, and Dugway sit on the RAB.

The RAB established a charter and working groups during 2000. RAB meetings are being held on a semiannual basis, in conjunction with Technical Review Committee meetings. Information repositories have been established at the DPG Directorate of Environmental Program, Tooele County Library, University of Utah and UDEQ-DSHW. RAB members are being provided program status updates through slide shows and handouts.

Dugway requested TAPP funds for FY 2001. The RAB did not submit a project request to access TAPP funding.